

SOUTHAMPTON COUNTY BOYKINS WWTP

APPLICATION FOR
THE REISSUANCE OF
VPDES PERMIT NO. VA0026417

| APPLICATION FOR | | NPDES Form 2A |
|--|----|--|
| REISSUANCE OF | | VPDES Sewage Sludge |
| VPDES PERMIT | 2 | Permit Application Form |
| NO. VA0026417 | 3 | VPDES Permit Application Addendum |
| BOYKINS WWTP | 4. | Permit Maintenance Fee Information |
| | 5 | Topographic Map |
| MAY 21, 2015 | 6 | Treatment Plant Process Flow Schematic |
| | 7 | |
| DEO | 8 | |
| RECEIVED - DEQ MAY 2 2 2015 Tidewater Regional Tidewater Office | 9 | |
| Tideweroffice | 10 | |
| | 11 | |

SOUTHAMPTON COUNTY

26022 Administration Center Drive P. O. Box 400 Courtland, Virginia 23837



757-653-3015 Fax: 757-653-0227

May 21, 2015

Mr. Robert Smithson DEQ – Tidewater Regional Office 5636 Southern Blvd Virginia Beach, VA 23462

RE: Boykins WWTP

VPDES Permit No. VA0026417 Renewal Application

Dear Mr. Smithson:

Please find enclosed our application for the reissuance of VPDES Permit No. VA0026417.

Should you any questions, please feel free to contact me at (757) 742-6233.

Respectfully submitted,

Robert E. Crab

Robert E. Croak

Southampton County

Dept. of Public Utilities

Form Approved 1/14/99

FORM

2A NPDES

NPDES FORM 2A APPLICATION OVERVIEW

APPLICATION OVERVIEW

Form 2A has been developed in a modular format and consists of a "Basic Application Information" packet and a "Supplemental Application Information" packet. The Basic Application Information packet is divided into two parts. All applicants must complete Parts A and C. Applicants with a design flow greater than or equal to 0.1 mgd must also complete Part B. Some applicants must also complete the Supplemental Application Information packet. The following items explain which parts of Form 2A you must complete.

BASIC APPLICATION INFORMATION:

- A. Basic Application Information for all Applicants. All applicants must complete questions A.1 through A.8. A treatment works that discharges effluent to surface waters of the United States must also answer questions A.9 through A.12.
- B. Additional Application Information for Applicants with a Design Flow ≥ 0.1 mgd. All treatment works that have design flows greater than or equal to 0.1 million gallons per day must complete questions B.1 through B.6.
- C. Certification. All applicants must complete Part C (Certification).

SUPPLEMENTAL APPLICATION INFORMATION:

- D. Expanded Effluent Testing Data. A treatment works that discharges effluent to surface waters of the United States and meets one or more of the following criteria must complete Part D (Expanded Effluent Testing Data):
 - 1. Has a design flow rate greater than or equal to 1 mgd,
 - 2. Is required to have a pretreatment program (or has one in place), or
 - 3. Is otherwise required by the permitting authority to provide the information.
- E. Toxicity Testing Data. A treatment works that meets one or more of the following criteria must complete Part E (Toxicity Testing Data):
 - 1. Has a design flow rate greater than or equal to 1 mgd,
 - 2. Is required to have a pretreatment program (or has one in place), or
 - 3. Is otherwise required by the permitting authority to submit results of toxicity testing.
- F. Industrial User Discharges and RCRA/CERCLA Wastes. A treatment works that accepts process wastewater from any significant industrial users (SIUs) or receives RCRA or CERCLA wastes must complete Part F (Industrial User Discharges and RCRA/CERCLA Wastes). SIUs are defined as:
 - 1. All industrial users subject to Categorical Pretreatment Standards under 40 Code of Federal Regulations (CFR) 403.6 and 40 CFR Chapter I, Subchapter N (see instructions); and
 - 2. Any other industrial user that:
 - a. Discharges an average of 25,000 gallons per day or more of process wastewater to the treatment works (with certain exclusions); or
 - Contributes a process wastestream that makes up 5 percent or more of the average dry weather hydraulic or organic capacity of the treatment plant; or
 - c. Is designated as an SIU by the control authority.
- G. Combined Sewer Systems. A treatment works that has a combined sewer system must complete Part G (Combined Sewer Systems).

ALL APPLICANTS MUST COMPLETE PART C (CERTIFICATION)

FACILITY NAME AND PERMIT NUMBER:

| Town | of Boykins WWTP | VA 0026417 | | | | |
|--------|---|---|--|---|---|--|
| ВА | SIC APPLICA | TION INFO | RMATION | | | |
| PAR | T A. BASIC APPL | ICATION INFO | ORMATION FOR ALL AP | PLICANTS: | | |
| All tr | eatment works must | t complete quest | ions A.1 through A.8 of thi | s Basic Application | Information packe | t. |
| A.1. | Facility Information | 1. | | | | |
| | Facility name | Town of Boyki | ns WWTP | | | |
| | Mailing Address | 26022 Adminis Courtland, VA | stration Center Drive PO . 23837 | Box 400 | | |
| | Contact person | Michael W. Jo | hnson | | | |
| | Title | County Admin | istrator | | | |
| | Telephone number | (757) 653-301 | 5 | | | |
| | Facility Address | | | | | |
| | (not P.O. Box) | Boykins, VA. 2 | 3827 | | | |
| A.2. | Applicant Informati | ion. If the applica | nt is different from the above | e, provide the followin | ıg: | |
| | Applicant name | | | | | |
| | Mailing Address | | | | | |
| | | | | | | |
| | Contact person | *************************************** | | <u> </u> | | |
| | Title | <u> </u> | | | <u>, , , , , , , , , , , , , , , , , , , </u> | |
| | Telephone number | | | | | |
| | | owner or operat | tor (or both) of the treatme | nt works? | | |
| I | v owner | respondence ren | operator arding this permit should be | directed to the facility | or the applicant. | |
| | facility | | applicant | | | |
| A.3. | Existing Environme | ental Permits. P | rovide the permit number of | any existing environn | nental permits that h | ave been issued to the treatment |
| | works (include state | -issued permits). | | | | |
| | NPDES <u>VA. 0026</u> | 6417 | | PSD | <u> </u> | |
| | | | | Other | | DCO) |
| | | | | | | DES) |
| A.4. | Collection System each entity and, if kr etc.). | Information. Pronown, provide info | ovide information on municip ormation on the type of collec | alities and areas servation system (combine | ved by the facility. Ped vs. separate) and | rovide the name and population of its ownership (municipal, private, |
| | Name | | Population Served | Type of Collect | ion System | Ownership |
| | Boykins & Branch | ville | 1133 | Separate | | Public |
| | Newsoms | | 478 | Separate | ····· | Public |
| | AEC Virginia, LLC | | 750 Equivalent Pop. | Separate | | <u>Private</u> |

Total population served 2361

| wn | of E | Boykins WWTP VA 0026417 | | | | | | | |
|-----|------|---|----------------------------------|--------------------|---|---------|--------------------------|---------------------|-------------------|
| 5. | ind | ian Country. | | | | | | | |
| | a. | Is the treatment works located in Indian Co | untry? | | | | | | |
| | | Yes | | | | | | | |
| | b. | Does the treatment works discharge to a re through) Indian Country? | eceiving water that is either in | n Indian Country o | or that is upstr | eam fro | m (and ev | rentually | flows |
| | | Yes No | | | | | | | |
| .6. | ave | w. Indicate the design flow rate of the treat rage daily flow rate and maximum daily flow iod with the 12th month of "this year" occurr | rate for each of the last thre | ee years. Each ye | ear's data mus | t be ba | handle). A sed on a 1 | Also pro 12-mont | vide th h time |
| | a. | Design flow rate mgd | | | | | | | |
| | | | Two Years Ago | Last Year | | This Y | <u>ear</u> | | |
| | b. | Annual average daily flow rate | 0.17 | | 0.18 | | | 0.18 | mgd |
| | C. | Maximum daily flow rate | 0.34 | | 0.44 | | | 0.31 | mgd |
| | | Separate sanitary sewerCombined storm and sanitary sewer | | | - | | | 100 | % % |
| .8. | Dis | charges and Other Disposal Methods. | | | | | | | |
| | | | et to company of the U.C.O. | | ./ | Yes | | | No |
| | a. | Does the treatment works discharge effluer | | ib - 444- | | _ 165 | | | NU |
| | | If yes, list how many of each of the following | g types of discharge points t | the treatment work | is uses: | | 1 | | |
| | | i. Discharges of treated effluent | ata d affluent | | | | 1 | | |
| | | ii. Discharges of untreated or partially trea | ateo eniuent | | | | 0 | | |
| | | iii. Combined sewer overflow points | or to the discontinuous | | | | 0 | | |
| | | iv. Constructed emergency overflows (price | | | | | 0 | | |
| | | v. Other | | | | | N/A | | |
| | b. | Does the treatment works discharge effluer impoundments that do not have outlets for | discharge to waters of the U | | | _ Yes | | ✓ | No |
| | | If yes, provide the following for each surfac | e impounament: | | | | | | |
| | | Location: Annual average daily volume discharged to | auriano impoundment(s) | | | | | ngd | |
| | | | | | | | ·················· ' | ngu | |
| | | Is discharge continuous or | intermittent? | | | | | | |
| | C. | Does the treatment works land-apply treate | ed wastewater? | | *************************************** | Yes | - | <u>√</u> | No |
| | | If yes, provide the following for each land a | pplication site: | | | | | | |
| | | Location: | | | | | | | |
| | | Number of acres: | | | | | | | |
| | | Annual average daily volume applied to site | e: | M | gd | | | | |
| | | Is land application continuo | ue or intermit | ttent? | | | | | |
| | | Is land application continuo | incomi | | | | | | |

FACILITY NAME AND PERMIT NUMBER:

FACILITY NAME AND PERMIT NUMBER:

Town of Boykins WWTP VA 0026417

| If transport is by a party other than the applicant, provide: |
|---|
| Transporter name: |
| Mailing Address: |
| |
| Contact person: |
| Title: |
| Telephone number: |
| For each treatment works that receives this discharge, provide the following: |
| Name: |
| Mailing Address: |
| |
| Contact person: |
| Title: |
| Telephone number: |
| If known, provide the NPDES permit number of the treatment works that receives this discharge. |
| Provide the average daily flow rate from the treatment works into the receiving facility. |
| Does the treatment works discharge or dispose of its wastewater in a manner not included in A.8.a through A.8.d above (e.g., underground percolation, well injection)? Yes |
| If yes, provide the following for each disposal method: |
| Description of method (including location and size of site(s) if applicable): |
| |

| Form App | roved : | 1/14/99 |
|----------|---------|----------|
| OMB Num | iber 20 | 040-0086 |

FACILITY NAME AND PERMIT NUMBER:

Town of Boykins WWTP VA 0026417

WASTEWATER DISCHARGES:

If you answered "yes" to question A.8.a, complete questions A.9 through A.12 once for each outfall (including bypass points) through which effluent is discharged. Do not include information on combined sewer overflows in this section. If you answered "no" to question A.8.a, go to Part B, "Additional Application Information for Applicants with a Design Flow Greater than or Equal to 0.1 mgd."

| 9. <i>D</i> E | escription of Outfall. | | | | | |
|---------------|--|---|--|---|--------------|-------------------|
| a. | Outfall number | 001 | | | | |
| b. | Location | Southampton Coun | ty | | | 837 |
| | | (City or town, if applicate Southampton | ole) | | VA | |
| | | (County) 36 32 55 | | | (Sta 77 | ate) 12 14 |
| | | (Latitude) | | | | ngitude) |
| C. | Distance from shore | (if applicable) | | N/A | ft. | |
| | | | ************************************** | 0 | ft. | |
| d. | Depth below surface | a (ir applicable) | | | | |
| e. | Average daily flow re | ate | | 0.31 | mgd | |
| f. | Does this outfall hav | ve either an intermittent or | а | | | |
| ,, | periodic discharge? | | _ | Yes | \checkmark | No (go to A.9.g.) |
| | If was provide the fo | ollowing information: | | | | _ |
| | ii yes, provide the le | and the second second | | | | |
| | Number of times per | r year discharge occurs: | | | | _ |
| | Average duration of | each discharge: | | | | |
| | Average flow per dis | scharge: | | | | _ mgd |
| | Months in which disc | charge occurs: | | | | |
| | | | | V | 1 | No |
| g. | Is outfall equipped v | vitn a diffuser? | ************************************** | Yes _ | <u> </u> | 140 |
| 40 D | escription of Receivi | ing Waters | | | | |
| 10. D | sacription of Neceivi | ing waters. | | | | |
| | | | River | | | |
| a. | Name of receiving w | vater Meherrin F | (146) | | | |
| | - | | | Pasin | | |
| a. b. | Name of receiving w | | Chowan River I | Basin | | |
| | Name of watershed | | Chowan River I | | Not Kno | own |
| | Name of watershed | (if known) | Chowan River I | own): | | own |
| | Name of watershed United States Soil C | (if known) | Chowan River I | | | own |
| b. | Name of watershed United States Soil C | (if known) Conservation Service 14-dig agement/River Basin (if kn | Chowan River I | own): Chowan Ri | ver Basin | |
| b. | Name of watershed United States Soil C | (if known) Conservation Service 14-di | Chowan River I | own): Chowan Ri | ver Basin | own 3010204 |
| b. c. | Name of watershed United States Soil C Name of State Mana United States Geold Critical low flow of re | (if known) Conservation Service 14-digagement/River Basin (if known) ogical Survey 8-digit hydroleceiving stream (if applicat | Chowan River I git watershed code (if known): C logic cataloging unit code ble): | own): <u>Chowan Ri</u> e (if known) | ver Basin | |
| b. c. | Name of watershed United States Soil C Name of State Mana United States Geold Critical low flow of reacute 30.42 | (if known) Conservation Service 14-digagement/River Basin (if known) ogical Survey 8-digit hydroleceiving stream (if applicat | Chowan River I git watershed code (if known): Code logic cataloging unit code ble): chronic | own): Chowan Ri e (if known) _70.22 (3 | ver Basin | 3010204 |

| | CILITY NAME AND PERMIT NUMBER: wn of Boykins WWTP VA 0026417 | | | | | | | | | Form Approved 1/14/99 OMB Number 2040-0086 | | | | | |
|---|---|-----------|---|--------------|--|---------------------|---|---------------------|--|---|---------|--|--|--|--|
| A.11. Description of Tre | atment | | *************************************** | | | | | | | | | | | | |
| a. What levels of | treatment a | ıre provi | ded? Cl | heck all tha | at ap | oply. | | | | | | | | | |
| Pri | mary | | | ✓ Se | con | dary | | | | | | | | | |
| Ad | vanced | | | Oti | her. | Describe: | | | | | | | | | |
| b. Indicate the fol | lowing rem | oval rate | es (as a | pplicable): | | | | | | | | | | | |
| Design BOD _s re | emoval <u>or</u> [| Design C | BOD ₅ r | removal | | | <u>>87</u> | | ······································ | % | | | | | |
| Design SS rem | oval | | | | | | <u>>87</u> | • | | % | | | | | |
| Design P remo | val | | | | | | ********** | | | % | | | | | |
| Design N remo | val | | | | | | B. C. | | | % | | | | | |
| Other | | | - | | | | | | | % | | | | | |
| c. What type of di | sinfection i | s used f | or the e | ffluent fron | n thi | s outfall? If disir | nfection varie | s by seas | son, p | lease describ | e. | | | | |
| Chlorine | | | | | | | | | | | | | | | |
| . If disinfection is | If disinfection is by chlorination, is dechlorination used for this outfall | | | | | | | | _ Ye | es | | No | | | |
| d. Does the treatr | ion? | | | ✓ | Ye | es | | No | | | | | | | |
| At a minimum, eff Outfall number: PARAMET | luent testi | ng data | must b | e based o | n a | t least three sa | mples and n | nust be r | no mo | ore than four | and | by 40 CFR Part 136. one-half years apart. | | | |
| 1 \(\frac{1}{2}\) \(\frac{1}{2}\) \(\frac{1}{2}\) | Lix | | | /alue | | Units | Value | | | Units Number of | | Number of Samples | | | |
| | | | | aluc | | Office | 1 | | <u> </u> | | - | | | | |
| pH (Minimum) | | | 6.4 | | | s.u. | | Tajakan Makabara | 1 (1 (1 (1 (1 (1 (1 (1 (1 (1 (1 (1 (1 (1 | | | t flyfeitiffe ti fleten ei flete ei fyfir Tilleten far Dei Hillet til fleten ei | | | |
| pH (Maximum) | | | 7.2 | | <u> </u> | s.u. | | | | | L | | | | |
| Flow Rate | | | 0.72 | - | m | gd | 0.31 | | mga | 3 | 100 | ontinuous (12 mo.) | | | |
| Temperature (Winter) | | | | | - | | | | _ | | - | | | | |
| Temperature (Summer) * For pH please rei | oort a minin | num and | i a max | imum daily | val | ue | <u> </u> | | <u> </u> | | <u></u> | | | | |
| POLLUTANT | <u> </u> | 7 | AXIMU | M DAILY | | | E DAILY DIS | CHARGE | Ξ. | ANALYTIC METHOD | | ML / MDL | | | |
| | | Co | nc. | Units | | Conc. | Units | Numb Sam | | | | | | | |
| CONVENTIONAL AND N | ONCONVE | ENTION | AL CO | VIPOUNDS | <u>. </u> | | | | | | | | | | |
| BIOCHEMICAL OXYGEN | BOD-5 | 26.0 | | mg/l | | 8.9 | mg/l | 3/wk, | 12m | 5210B | | 2.0 | | | |
| DEMAND (Report one) | CBOD-5 | | | ļ | | | ļ | | | | | | | | |
| FECAL COLIFORM | | <u> </u> | | | | | | | | | | | | | |
| TOTAL SUSPENDED SOL | IDS (TSS) | 77.0 | | mg/l | | 28.7 | mg/l | 3/wk, | 12m | 2540D | | 1.0 | | | |
| | | | | I | ΕN | D OF PAF | RT A. | | | | | | | | |

REFER TO THE APPLICATION OVERVIEW TO DETERMINE WHICH OTHER PARTS OF FORM 2A YOU MUST COMPLETE

Town of Boykins WWTP VA 0026417

Form Approved 1/14/99 OMB Number 2040-0086

| BA | SIC | APPLICATION INFORMATION |
|-------|----------------|---|
| PAF | T B. | ADDITIONAL APPLICATION INFORMATION FOR APPLICANTS WITH A DESIGN FLOW GREATER THAN OR EQUAL TO 0.1 MGD (100,000 gallons per day). |
| All a | pplica | nts with a design flow rate \geq 0.1 mgd must answer questions B.1 through B.6. All others go to Part C (Certification). |
| B.1. | inflo | ow and Infiltration. Estimate the average number of gallons per day that flow into the treatment works from inflow and/or infiltration. Unknown_gpd |
| | Brie | fly explain any steps underway or planned to minimize inflow and infiltration. |
| | Per | iodic Smoke Testing |
| B.2. | This | ographic Map. Attach to this application a topographic map of the area extending at least one mile beyond facility property boundaries. map must show the outline of the facility and the following information. (You may submit more than one map if one map does not show entire area.) |
| | a. | The area surrounding the treatment plant, including all unit processes. |
| | b. ' | The major pipes or other structures through which wastewater enters the treatment works and the pipes or other structures through which treated wastewater is discharged from the treatment plant. Include outfalls from bypass piping, if applicable. |
| | | Each well where wastewater from the treatment plant is injected underground. |
| | d. | Wells, springs, other surface water bodies, and drinking water wells that are: 1) within 1/4 mile of the property boundaries of the treatment works, and 2) listed in public record or otherwise known to the applicant. |
| | | Any areas where the sewage sludge produced by the treatment works is stored, treated, or disposed. |
| | | If the treatment works receives waste that is classified as hazardous under the Resource Conservation and Recovery Act (RCRA) by truck, rail, or special pipe, show on the map where that hazardous waste enters the treatment works and where it is treated, stored, and/or disposed. |
| B.3. | backi | ess Flow Diagram or Schematic. Provide a diagram showing the processes of the treatment plant, including all bypass piping and all up power sources or redundancy in the system. Also provide a water balance showing all treatment units, including disinfection (e.g, ination and dechlorination). The water balance must show daily average flow rates at influent and discharge points and approximate daily rates between treatment units. Include a brief narrative description of the diagram. |
| B.4. | Oper | ration/Maintenance Performed by Contractor(s). |
| | Are a | iny operational or maintenance aspects (related to wastewater treatment and effluent quality) of the treatment works the responsibility of a actor? YesNo |
| | | s, list the name, address, telephone number, and status of each contractor and describe the contractor's responsibilities (attach additional s if necessary). |
| | Nam | e: McGill Environmental Systems Permit No. VPA00837 |
| | Maili | ng Address: 5056 Beef Steak Road, Waverly, VA. 23890 |
| | Telep | phone Number: (757) 647-6052 |
| | Resp | onsibilities of Contractor: Accepts sewage sludge for disposal |
| B.5. | unco treati | eduled Improvements and Schedules of Implementation. Provide information on any uncompleted implementation schedule or impleted plans for improvements that will affect the wastewater treatment, effluent quality, or design capacity of the treatment works. If the ment works has several different implementation schedules or is planning several improvements, submit separate responses to question or each. (If none, go to question B.6.) |
| | a. | List the outfall number (assigned in question A.9) for each outfall that is covered by this implementation schedule. |
| | | N/A |
| | b. | Indicate whether the planned improvements or implementation schedule are required by local, State, or Federal agencies. YesNo |

| | Y NAME AND PERI Boykins WWTP V | | | | | | | proved 1/14/99 mber 2040-0086 |
|----------------------|---|--------------------------------------|-------------------------------------|------------------------------------|--|---------------------------------------|--|---|
| c | If the answer to B. | 5.b is "Yes," bri | efly describe, inc | cluding new max | imum daily inflow | rate (if applicat | ole). | *************************************** |
| d. | Provide dates impo applicable. For im applicable. Indicat | provements pla | inned independe | ently of local, Sta | dates of completi te, or Federal ag | ion for the imple encies, indicate | mentation steps liste planned or actual co | d below, as mpletion dates, as |
| | •• | | Schedule |) | Actual Completic | on | | |
| | Implementation St | age | MM / DD | / YYYY 1 | MM / DD / YYYY | | | |
| | - Begin construction | • | | / | | | | |
| | - End construction | | / | | | | | |
| | - Begin discharge | | / | | | | | |
| | - Attain operations | al level | / | | | | | |
| e. | Have appropriate (| permits/clearan | ces concerning | other Federal/Sta | ate requirements | been obtained? | Yes | No |
| | Describe briefly: | n/a | | | | | | |
| | | | | | | ····· | | |
| me sta pol | thods In addition | this data must of analytes not ad | comply with QA/0 dressed by 40 C | QC requirements FR Part 136. At | of 40 CFR Part a minimum, efflu | 136 and other a | nducted using 40 CF ppropriate QA/QC re must be based on a | quirements for |
| Р | OLLUTANT | | IUM DAILY CHARGE | AVERA | AGE DAILY DISC | CHARGE | | |
| | | Conc. | Units | Conc. | Units | Number of Samples | ANALYTICAL METHOD | ML / MDL |
| CONVEN | TIONAL AND NON | CONVENTION | AL COMPOUNI | DS. | | | <u> </u> | |
| AMMONI | A (as N) | 10.7 | mg/l | 3.69 | mg/l | 1/mo./9mo. | 350.3 | 0.1 mg/l |
| CHLORIN RESIDUA | IE (TOTAL IL, TRC) | <100 | ug/l | <100 | ug/l | 365/12mo. | DPD | 100 |
| DISSOLV | ED OXYGEN | 9.0 | mg/l | 6.3 | mg/l | 365/12mo. | D.O. Meter | |
| | JELDAHL | | | | | | | |
| NITROGE NITRATE | PLUS NITRITE | | | | | | | |
| NITROGE OIL and C | | | | | | _ | | |
| | | | | | | | | |
| | ORUS (Total) | | | | | | | |
| SOLIDS (| • | | | | | | | |
| =9903 292 | e total | 18.0 | ug/l | 11.8 | ug/l | 1/mo,10mo | 200.7 | 0.005 ug/l |

END OF PART B.

REFER TO THE APPLICATION OVERVIEW TO DETERMINE WHICH OTHER PARTS OF FORM

2A YOU MUST COMPLETE

| FACILITY NAME AND I | PERMIT NUMBER: | | Form Approved 1/14/99 |
|--|--|--|--|
| Town of Boykins WW | TP VA 0026417 | | OMB Number 2040-0086 |
| BASIC APPLIC | ATION INFORMAT | TION | |
| | | | |
| PART C. CERTIFICA | TION | | |
| applicants must complet have completed and are | e all applicable sections of F | form 2A, as explained in the Apcertification statement, applica | rmine who is an officer for the purposes of this certification. All oplication Overview. Indicate below which parts of Form 2A you nts confirm that they have reviewed Form 2A and have completed |
| Indicate which parts of | Form 2A you have comple | eted and are submitting: | |
| ✓ Basic Applie | cation Information packet | Supplemental Application I | nformation packet: |
| | | ✓ Part D (Expanded) | Effluent Testing Data) |
| | | | esting: Biomonitoring Data) |
| | | | Jser Discharges and RCRA/CERCLA Wastes) |
| | | Part G (Combined | · · |
| | | Pair G (Combined | Sewer Systems) |
| ALL APPLICANTS MUS | ST COMPLETE THE FOLLO | OWING CERTIFICATION. | |
| designed to assure that who manage the system | qualified personnel properly or those persons directly red complete. I am aware that | gather and evaluate the inform sponsible for gathering the info | under my direction or supervision in accordance with a system nation submitted. Based on my inquiry of the person or persons ormation, the information is, to the best of my knowledge and for submitting false information, including the possibility of fine |
| Name and official title | phnson, Coب Michael W. | ounty Administrator | |
| | Wa: () 1. () | 1 | |
| Signature | was no | | |
| Telephone number | (757) 653-3015 | | |
| Date signed | MAY 7, | 2015 | |
| | mitting authority, you must so | | cessary to assess wastewater treatment practices at the treatment |

SEND COMPLETED FORMS TO:

Town of Boykins WWTP VA 0026417

SUPPLEMENTAL APPLICATION INFORMATION

PART D. EXPANDED EFFLUENT TESTING DATA Test Results Attached

Refer to the directions on the cover page to determine whether this section applies to the treatment works.

Effluent Testing: 1.0 mgd and Pretreatment Treatment Works. If the treatment works has a design flow greater than or equal to 1.0 mgd or it has (or is required to have) a pretreatment program, or is otherwise required by the permitting authority to provide the data, then provide effluent testing data for the following pollutants. Provide the indicated effluent testing information and any other information required by the permitting authority for each outfall through which effluent is discharged. Do not include information on combined sewer overflows in this section. All information reported must be based on data collected through analyses conducted using 40 CFR Part 136 methods. In addition, these data must comply with QA/QC requirements of 40 CFR Part 136 and other appropriate QA/QC requirements for standard methods for analytes not addressed by 40 CFR Part 136. Indicate in the blank rows provided below any data you may have on pollutants not specifically listed in this form. At a minimum, effluent testing data must be based on at least three pollutant scans and must be no more than four and one-half years old.

| POLLUTANT | | DISCH | | | | | DAILY | | | | |
|--|--------------|-----------|----------|-----------|------------|--|------------|-------------|-------------------------|----------------------|---------|
| | Conc. | | Mass | Units | Conc. | Units | Mass | Units | Number of Samples | ANALYTICAL METHOD | ML/ MDL |
| METALS (TOTAL RECOVERABLE), | CYANIDE, | PHENO | LS, AND | HARDNE | SS. | ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,, | | | | | |
| ANTIMONY | | | | | | | | | | | |
| ARSENIC | | | | | | | | | | | |
| BERYLLIUM | | | | | | | | | | | |
| CADMIUM | | | | | | | | | | | |
| CHROMIUM | | | | | | | | | | | |
| COPPER | | | | | | | | | | | |
| LEAD | | | | | | | | | | | |
| MERCURY | | | | | | | | | | | |
| NICKEL | | | , | | | | | | | | |
| SELENIUM | | | | | | | | | | | |
| SILVER | | | | | | | | | | | |
| THALLIUM | | | | | | | | | | | |
| ZINC | | | | | | | | | | | |
| CYANIDE | | | | | | | , | | | | |
| TOTAL PHENOLIC COMPOUNDS | | | | | | | | | | | |
| HARDNESS (AS CaCO ₃) | | | | | | | | | | | |
| Use this space (or a separate sheet) t | o provide in | formation | on other | metals re | equested t | y the per | mit writer | | Т | | |
| | | | | | 1 | | | | | 1 | |

FACILITY NAME AND PERMIT NUMBER:

Town of Boykins WWTP VA 0026417

(Complete once for each outfall discharging effluent to waters of the United States.) Outfall number: AVERAGE DAILY DISCHARGE POLLUTANT MAXIMUM DAILY DISCHARGE Units Mass Units Number ANALYTICAL ML/ MDL Units Mass Units Conc. Conc. METHOD of Samples VOLATILE ORGANIC COMPOUNDS. **ACROLEIN** ACRYLONITRILE BENZENE BROMOFORM CARBON TETRACHLORIDE CLOROBENZENE CHLORODIBROMO-METHANE CHLOROETHANE 2-CHLORO-ETHYLVINYL CHLOROFORM DICHLOROBROMO-METHANE 1,1-DICHLOROETHANE 1,2-DICHLOROETHANE TRANS-1,2-DICHLORO-ETHYLENE 1,1-DICHLOROETHYLENE 1,2-DICHLOROPROPANE 1,3-DICHLORO-PROPYLENE ETHYLBENZENE METHYL BROMIDE METHYL CHLORIDE METHYLENE CHLORIDE 1,1,2,2-TETRACHLORO-ETHANE TETRACHLORO-ETHYLENE TOLUENE

FACILITY NAME AND PERMIT NUMBER:

Town of Boykins WWTP VA 0026417

| Outfall number: | | | | | | | | | the United S | States.) | |
|---|------------|----------|-------------------|------------|------------|---------|------------|-----------|-------------------------|----------------------|---|
| POLLUTANT | N | DISCH | IM DAIL` IARGE | | | | DAILY | | | | |
| | Conc. | Units | Mass | Units | Conc. | Units | Mass | Units | Number of Samples | ANALYTICAL METHOD | ML/ MDL |
| 1,1,1-TRICHLOROETHANE | | | | | | | | | | www.www.companyanowa | *************************************** |
| 1,1,2-TRICHLOROETHANE | | | | | | | | | | | |
| TRICHLORETHYLENE | | | | | | | | | | | |
| VINYL CHLORIDE | | | | | | | | | | | |
| Use this space (or a separate sheet) to | provide in | formatio | n on other | volatile o | rganic cor | npounds | requeste | by the p | permit writer. | | |
| | | | | | | | | | | | |
| ACID-EXTRACTABLE COMPOUNDS | I | | | 1 | <u> </u> | 1 | | | | | |
| P-CHLORO-M-CRESOL | | | | | | | | | | | |
| 2-CHLOROPHENOL | | | | | | | | | | | |
| 2,4-DICHLOROPHENOL | | | | | | | | | | | |
| 2,4-DIMETHYLPHENOL | | | | | | | | | | | |
| 4,6-DINITRO-O-CRESOL | | | | | | | | | | | |
| 2,4-DINITROPHENOL | | | | | | | | | | | |
| 2-NITROPHENOL | | | | | | | | | | | |
| 4-NITROPHENOL | | | | | | | | | | | |
| PENTACHLOROPHENOL | | | | | | | | | | | |
| PHENOL | | | | | | | | | | | |
| 2,4,6-TRICHLOROPHENOL | | | | | | | | | | | |
| Use this space (or a separate sheet) to | provide in | formatio | n on other | acid-extr | actable co | mpounds | s requeste | ed by the | permit writer. | | F |
| | | | | | | | | | | | |
| BASE-NEUTRAL COMPOUNDS. | 1 | L | L | L | 1 | | | | | | |
| ACENAPHTHENE | | | | | | | | | | | |
| ACENAPHTHYLENE | | | | | | | | | | | |
| ANTHRACENE | | | | | | | | | | | |
| BENZIDINE | | | | | | | | | | | |
| BENZO(A)ANTHRACENE | | | | | | | | | | | |
| BENZO(A)PYRENE | | | | | | | | | | | |

CLIENT: Southampton County

ATTN: Dennis E. Beale

ADDRESS: 17287 Pittman Road

Boykins, VA 23827

PHONE: (757) 653-9269/653-8187cell

FAX: dbeale@southamptoncounty.org (D

Special Notes: RE: BOYKINS WWP (PART D)

SAMPLE COLLECTED BY:

GRAB COLLECTION:

Date: 10/11/2013 Time: 0830

COMPOSITE COLLECTION:

Start Date: 10/10/13 Time: 0700

End Date: 10/11/13 Time: 0700

PICK UP BY: REED - JH

SAMPLE RECEIPT:

Date: 10/11/2013 Time: 1430

NUMBER OF CONTAINERS: 0

SAMPLE CONDITION: ✓ Good ☐ Other (See C-O-C)

REPORT NO: 13-15681 16:40

SAMPLE ID: BOYKINS WWP FINAL EFF

SAMPLE NO: 13-15681

| | Method | JRA | | | | | *************************************** |
|------------------------------|--------|--------|----------|------|---------|----------|---|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Total Antimony | 200.7 | 0.005 | 0.100 | mg/L | EFA | 10/17/13 | 1132 |
| Total Arsenic | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 10/17/13 | 1132 |
| Total Beryllium | 200.7 | 0.0005 | < 0.0005 | mg/L | EFA | 10/17/13 | 1132 |
| Total Cadmium | 200.7 | 0.0005 | < 0.0005 | mg/L | EFA | 10/17/13 | 1132 |
| Total Chromium | 200.7 | 0.001 | < 0.001 | mg/L | EFA | 10/17/13 | 1132 |
| Total Copper | 200.7 | 0.002 | 0.016 | mg/L | EFA | 10/17/13 | 1132 |
| Total Lead | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 10/17/13 | 1132 |
| Total Nickel | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 10/17/13 | 1132 |
| Total Mercury | 245.1 | 0.0002 | < 0.0002 | mg/L | LEF | 10/16/13 | 1235 |
| Total Silver | 200.7 | 0.001 | < 0.001 | mg/L | EFA | 10/17/13 | 1132 |
| Total Selenium | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 10/17/13 | 1132 |
| Total Thallium | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 10/16/13 | 1136 |
| Total Zinc | 200.7 | 0.005 | 0.047 | mg/L | EFA | 10/17/13 | 1132 |
| Hardness | *2340B | 0.331 | 41.1 | mg/L | EFA | 10/17/13 | 1132 |
| Cyanide | 335.4 | 0.005 | < 0.005 | mg/L | LEF | 10/17/13 | 1150 |
| Phenols | 420.4 | 0.02 | < 0.02 | mg/L | PEJ | 10/18/13 | 1553 |
| Semi-Volatiles | | | | | | | |
| N-Nitroso-di-n-propylamine | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Acenaphthene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 2,6-Dinitrotoluene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Dimethyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Acenaphthylene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Naphthalene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Bis(2-chloroethoxy)methane | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Isophorone | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Nitrobenzene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Bis(2-chloroisopropyl) ether | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Bis(2-chloroethyl) ether | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| N-Nitrosodimethylamine | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Hexachlorobenzene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |

James R. Reed & Associates

770 Pilot House Drive, Newport News, VA 23606

(757) 873-4703 • Fax: (757) 873-1498



SAMPLE ID: BOYKINS WWP FINAL EFF

SAMPLE NO: 13-15681

| | Method | JRA | | | | | |
|-----------------------------|---|--|--------|------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Semi-Volatiles | | ······································ | | | | | |
| Pentachlorophenol | 625 | 10 | < 10 | ug/L | CLH | 10/21/13 | 2331 |
| Hexachlorocyclopentadiene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 2,4-Dinitrotoluene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Hexachloroethane | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 2-Chloronaphthalene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 1,2,4-Trichlorobenzene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Benzo[g,h,i]Perylene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 4,6 Dinitro-o-cresol | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 2,4-Dinitrophenol | 625 | 20 | < 20 | ug/L | CLH | 10/21/13 | 2331 |
| 4-Chloro 3-Methylphenol | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 2,4-Dichlorophenol | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 2,4-Dimethylphenol | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 2-Nitrophenol | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Benzo[b]Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 2-Chlorophenol | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 4-Nitrophenol | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Dibenz[a,h]Anthracene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Indeno[1,2,3-c,d]Pyrene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Fluorene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Benzo[a]Pyrene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Hexachlorobutadiene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Benzo[k]Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Phenol | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Anthracene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 4-Chlorophenyl phenyl ether | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Diethyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 1,2,-Diphenylhydrazine | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| N-nitroso-di-phenylamine | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 2,4,6-Trichlorophenol | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Phenanthrene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Di-n-Octyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| di-n-Butyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 3,3-Dichlorobenzidine | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| 4-Bromophenyl phenyl ether | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Bis(2-ethylhexyl) phthalate | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Pyrene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Chrysene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Benzo[a]Anthracene | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Butyl benzyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Benzidine | 625 | 5 | < 5 | ug/L | CLH | 10/21/13 | 2331 |
| Volatiles | | | | _ | | | |
| 1,1-Dichloroethane | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Benzene | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| | *************************************** | | | | | | |

James R. Reed & Associates

770 Pilot House Drive, Newport News, VA 23606

(757) 873-4703 • Fax: (757) 873-1498



BOYKINS WWP FINAL EFF SAMPLE ID:

SAMPLE NO: 13-15681

| | Method | JRA | | | | | |
|-----------------------------------|--------|-------------|--------|------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Volatiles | | | | | | | |
| Bromomethane | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Vinyl Chloride | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Chloroethane | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Methylene Chloride/Dichloromethan | e 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| 1,1-Dichloroethene | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Chloromethane (Methyl Chloride) | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Bromoform | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| trans-1,2-Dichloroethene | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| 1,4-Dichlorobenzene | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| 1,3-Dichlorobenzene | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| 1,2-Dichlorobenzene | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| 1,3-Dichloropropene(cis & trans) | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Acrylonitrile | 624 | 50 | < 50 | ug/L | CLH | 10/15/13 | 0201 |
| Acrolein | 624 | 50 | < 50 | ug/L | CLH | 10/15/13 | 0201 |
| Ethylbenzene | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Chlorobenzene/Monochlorobenzene | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Dibromochloromethane | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Tetrachloroethene | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Chloroform | 624 | 5 | 24 | ug/L | CLH | 10/15/13 | 0201 |
| 2-Chloroethyl vinyl ether | 624 | 10 | < 10 | ug/L | CLH | 10/15/13 | 0201 |
| 1,1,2-Trichloroethane | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Trichloroethene | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| 1,2-Dichloropropane | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| 1,1,2,2-Tetrachloroethane | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Bromodichloromethane | 624 | 5 | 6 | ug/L | CLH | 10/15/13 | 0201 |
| Carbon Tetrachloride | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| 1,1,1-Trichloroethane | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| 1,2-Dichloroethane | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |
| Toluene | 624 | 5 | < 5 | ug/L | CLH | 10/15/13 | 0201 |

James R. Reed & Associates

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(757) 873-4703 • Fax: (757) 873-1498

VELAP# 460013

SAMPLE ID: BOYKINS WWP FINAL EFF

SAMPLE NO: 13-15681

Method JRA
Parameter Number QL Result Unit Analyst Date Time

NOTES:

JRA Quantification Level is the concentration of the lowest calibration standard above zero with a reliable signal.

Reproduction of this report is not permitted, except in full, without written approval from James R Reed & Associates.

The results on this report relate only to the sample(s) provided for analysis.

Results conform to NELAC standards, where applicable, unless otherwise indicated.

*SM 20 Ed.

Authorized By:

Elaine Claiborne, Laboratory Director

Date: 24-Oct-13





CHAIN OF CUSTODY

ANALYSES REQUESTED

| | | | | | | | | | | | | | | | | -+ HCi | | + NaOH | , 50 ₄ | | | |
|-----------|---|---|----------------------------------|-----------|---------------------|--|-----|---|---|-------------|---|----------|--|---|----------------|------------------------|---------------------------------------|---|---|-------------------------|---------------------------|------------------|
| | | | | | | | | | | | | | | | | 10=Ascorbic Acid + HCI | 11=HCI | 12=Zinc Acetate + NaOH | 14=Na ₂ SO ₃ + H ₂ SO ₄ | Positive Negative | | * |
| D1-2 E1-2 | - | **(626) | sAN8 s | əlitsle | ovimə2 | × | 9 | | | | | | | | | $6 = Na_2S_2O_3 + HCI$ | OH + ZnOAc | SO ₄ + FAS | <u>,</u> | | | gent: |
| ပ | 1,8 | | **(4) | | Phenol | _ | (1) | Н | | 1521 2 N | 1 | X | | | Preservatives: | 1 = <6°C 6 = Na | 2 = HNO ₃ 7 = NaOH + ZnOAc | 3 = H ₂ SO ₄ 8 = H ₂ SO ₄ + FAS | 5 = Na ₂ S ₂ O ₃ | *CN Interference Check: | Sulfide: | Oxidizing Agent: |
| A B | 2 1,4 | з (СаСОЗ) | | | | ـــ | F | | _ | 2 H | | 3 | | | Pre | - | 2 == | | | , , | 5 | |
| Bottle ID | Preserv. | | | - | Total # of cont. | 7 | | | | | | | | - | | , | | THE SIL | \ \ \ \ \ | • | 10 hrs. | |
| | | | | 9 | Time | 2 C.S.7 Z | | | | | | | | | | 9 | 2440 | 1143 | 杨 | 1 | MY 6.9 Temp, 192 OBYONES. | |
| | | | , , | Grab | Date | 5/-1/-01/00 10 | | | | | | | | | , | 10150 | 13/ | 113 | 1130 | , | on of | |
| | | 3-9269 | | | End | <u>. </u> | . I | | | | | | | e, OTHERS | | Date/Time: //フィ片) | Date/Time: 10 -1/- 1 | e. 10/1 | ie: (b) (1) | 1 | 7 5.9 | |
| | | Telephone: 757-653-9269 Fax: 757-654-6025 VA 23827 | | site | End Date | 10-11-13 | | | | | | | | rdous Wast | | Date/Tim | Date/Tim | Date/Time | Date/Time | Ĩ |) L/ | |
| | ities | elephone: Fax: 7A 23827 | | Composite | Start | 0010 81-01-01 | | | | | | | | HW - Hazaı | | | | | | | | |
| | ublic Util | T Toykins, \ | Irt D) | | Start Date | 1-01-01 | | | | | | | | ng Water, | | | | 460 | 12/21 | | | |
| | Company Name: Southampton County Public Utilities | Contact: Raymond Bryant Telephone Fax sults To: Raymond Bryant Fax Address: 17287 Pittman Road, Boykins, VA 23827 | Project ID: Boykins WWP (Part D) | | Sample Location | Bullin, WW | 4 | | | | | | | *WW= Wastewater, GW = Groundwater, DW - Drinking Water, HW - Hazardous Waste, | | Janal Luke | Gob Parex | SRICE PAHICH | J. M. Common | Mark | | |
| | Company Name: S | Company Contact: R Results To: R Address: 1 | Project ID: E | | JRA Sample S | 1 | | | | | | | | VW= Wastewater, GW = | | Sampled By: | Relinquished By: | Received By: | Received By: | for Compliance | Not for Compliance | |

JAMES R. REED and ASSOCIATES (757) 873-4703; FAX (757) 873-1498 770 Pilot House Drive, Newport News, VA 23606

CLIENT:

Southampton County

ATTN:

Dennis E. Beale

ADDRESS: 17287 Pittman Road

Boykins, VA 23827

PHONE:

(757) 653-9269/653-8187cell

FAX:

dbeale@southamptoncounty.org (D

Special Notes: RE: BOYKINS WWP (PART D)

SAMPLE COLLECTED BY: CLIENT

GRAB COLLECTION:

Date: 4/22/2014

Time: 1220

COMPOSITE COLLECTION:

Start Date: 04/21/14 Time: 1210

End Date: 04/22/14 Time: 1210

PICK UP BY: REED - JS

SAMPLE RECEIPT:

Date: 4/23/2014

Time: 1410

NUMBER OF CONTAINERS: 7

SAMPLE CONDITION: ✓ Good ☐ Other (See C-O-C)

REPORT NO: 14-06229 11:14

SAMPLE ID:

BOYKIN EFF

SAMPLE NO: 14-06229

| | Method | JRA | | | | | |
|------------------------------|--------|--------|----------|------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Total Antimony | 200.7 | 0.005 | 0.017 | mg/L | EFA | 05/05/14 | 1208 |
| Total Arsenic | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 05/05/14 | 1208 |
| Total Beryllium | 200.7 | 0.0005 | < 0.0005 | mg/L | EFA | 05/05/14 | 1208 |
| Total Cadmium | 200.7 | 0.0005 | < 0.0005 | mg/L | EFA | 05/05/14 | 1208 |
| Total Chromium | 200.7 | 0.001 | < 0.001 | mg/L | EFA | 05/05/14 | 1208 |
| Total Copper | 200.7 | 0.002 | 0.009 | mg/L | EFA | 05/05/14 | 1208 |
| Total Lead | 200.7 | 0.005 | 0.024 | mg/L | EFA | 05/05/14 | 1208 |
| Total Nickel | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 05/05/14 | 1208 |
| Total Mercury | 245.1 | 0.0002 | < 0.0002 | mg/L | PEJ | 04/30/14 | 1508 |
| Total Silver | 200.7 | 0.001 | < 0.001 | mg/L | EFA | 05/05/14 | 1208 |
| Total Selenium | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 05/05/14 | 1208 |
| Total Thallium | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 05/05/14 | 1208 |
| Total Zinc | 200.7 | 0.005 | 0.023 | mg/L | EFA | 05/05/14 | 1208 |
| Hardness | *2340B | 0.331 | 46.5 | mg/L | EFA | 05/05/14 | 1208 |
| Cyanide | 335.4 | 0.005 | < 0.005 | mg/L | LEF . | 04/29/14 | 1341 |
| Phenols | 420.4 | 0.02 | < 0.02 | mg/L | PEJ | 05/06/14 | 1452 |
| Semi-Volatiles | | | | | | | |
| N-Nitroso-di-n-propylamine | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Acenaphthene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 2,6-Dinitrotoluene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Dimethyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Acenaphthylene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Naphthalene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Bis(2-chloroethoxy)methane | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Isophorone | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Nitrobenzene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Bis(2-chloroisopropyl) ether | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Bis(2-chloroethyl) ether | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| N-Nitrosodimethylamine | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Hexachlorobenzene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |

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SAMPLE ID: BOYKIN EFF SAMPLE NO: 14-06229

| | Method | JRA | | | | _ | |
|-----------------------------|------------|----------|--------|-----------|---------|-----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Semi-Volatiles | | | | | | | • |
| Pentachiorophenol | 625 | 10 | < 10 | ug/L | CLH | 05/05/14 | 1933 |
| Hexachlorocyclopentadiene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 2,4-Dinitrotoluene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Hexachloroethane | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 2-Chloronaphthalene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 1,2,4-Trichlorobenzene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Benzo[g,h,i]Perylene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 4,6 Dinitro-o-cresol | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 2,4-Dinitrophenol | 625 | 20 | < 20 | ug/L | CLH | 05/05/14 | 1933 |
| 4-Chloro 3-Methylphenol | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 2,4-Dichlorophenol | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 2,4-Dimethylphenol | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 2-Nitrophenol | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Benzo[b]Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 2-Chlorophenol | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 4-Nitrophenol | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Dibenz[a,h]Anthracene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Indeno[1,2,3-c,d]Pyrene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Fluorene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Benzo[a]Pyrene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Hexachlorobutadiene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Benzo[k]Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Phenol | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Anthracene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 4-Chlorophenyl phenyl ether | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Diethyl phthalate | 625 | 5 . | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 1,2,-Diphenylhydrazine | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| N-nitroso-di-phenylamine | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 2,4,6-Trichlorophenol | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Phenanthrene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Di-n-Octyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| di-n-Butyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 3,3-Dichlorobenzidine | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| 4-Bromophenyl phenyl ether | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Bis(2-ethylhexyl) phthalate | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Pyrene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Chrysene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Benzo[a]Anthracene | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Butyl benzyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Benzidine | 625 | 5 | < 5 | ug/L | CLH | 05/05/14 | 1933 |
| Volatiles | 020 | - | ~ | ے ہے۔ | ~~., | | |
| 1,1-Dichloroethane | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| | 624 624 | <i>5</i> | < 5 | | CLH | 04/24/14 | 1805 |
| Benzene | 024 | J | \ J | ug/L | CUI | V11171119 | 1007 |

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SAMPLE ID: BOYKIN EFF SAMPLE NO: 14-06229

| | Method | JRA | - | | | | |
|-----------------------------------|--------|-----|--------|------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Volatiles | | | | | | | |
| Bromomethane | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Vinyl Chloride | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Chloroethane | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Methylene Chloride/Dichloromethan | e 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| 1,1-Dichloroethene | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Chloromethane (Methyl Chloride) | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Bromoform | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| trans-1,2-Dichloroethene | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| 1,4-Dichlorobenzene | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| 1,3-Dichlorobenzene | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| 1,2-Dichlorobenzene | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| 1,3-Dichloropropene(cis & trans) | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Acrylonitrile | 624 | 50 | < 50 | ug/L | CLH | 04/24/14 | 1805 |
| Acrolein | 624 | 50 | < 50 | ug/L | CLH | 04/24/14 | 1805 |
| Ethylbenzene | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Chlorobenzene/Monochlorobenzene | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Dibromochloromethane | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Tetrachloroethene | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Chloroform | 624 | 5 | 50 | ug/L | CLH | 04/24/14 | 1805 |
| 2-Chloroethyl vinyl ether | 624 | 10 | < 10 | ug/L | CLH | 04/24/14 | 1805 |
| 1,1,2-Trichloroethane | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Trichloroethene | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| 1,2-Dichloropropane | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| 1,1,2,2-Tetrachloroethane | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Bromodichloromethane | 624 | 5 | 6 | ug/L | CLH | 04/24/14 | 1805 |
| Carbon Tetrachloride | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| 1,1,1-Trichloroethane | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| 1,1,1-1 richloroethane | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| * | 624 | 5 | < 5 | ug/L | CLH | 04/24/14 | 1805 |
| Toluene | U24 | J | - 3 | -5- | | | |

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VELAP# 460013

EPA# VA00015

ORAL

ORAL

SAMPLE ID: **BOYKIN EFF** SAMPLE NO: 14-06229

Method JRA Parameter Number QLResult Unit Analyst Date Time

NOTES:

JRA Quantification Level is the concentration of the lowest calibration standard above zero with a reliable signal.

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The results on this report relate only to the sample(s) provided for analysis.

Results conform to NELAC standards, where applicable, unless otherwise indicated.

*SM 1997

Authorized By: This Clarlan

Elaine Claiborne, Laboratory Director

Date: 08-May-14



CLIENT: Southampton County

ATTN: Dennis E. Beale

ADDRESS: 24283 Old Bridge Road

Courtland, VA 23837

PHONE: (757) 653-9269/653-8187cell

FAX: e: dbeale@southamptoncounty.org

Special Notes:

RE: BOYKINS WWP (PART D)

SAMPLE COLLECTED BY: CLIENT

GRAB COLLECTION:

Date: 9/4/2014 Time: 1515

COMPOSITE COLLECTION:

COMPOSITE COLLECTION.

Start Date: 09/04/14 Time: 0706

End Date: 09/04/14 Time: 1506

PICK UP BY: REED - JS

SAMPLE RECEIPT:

Date: 9/5/2014

Time: 1436

NUMBER OF CONTAINERS: 9

SAMPLE CONDITION: ✓ Good ☐ Other (See C-O-C)

REPORT NO: 14-13493 9:55

SAMPLE ID: BOYKIN EFF SAMPLE NO: 14-13493

| | Method | JRA | | | | | |
|-----------------------------|---------|--------|----------|------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| TSS | *2540D | 1.0 | 14 | mg/L | JW | 09/08/14 | 1045 |
| BOD5 | **5210B | 2 | 5 | mg/L | JMS | 09/05/14 | 1645 |
| Total Antimony | 200.7 | 0.005 | 0.063 | mg/L | EFA | 09/12/14 | 1417 |
| Total Arsenic | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 09/12/14 | 1417 |
| Total Beryllium | 200.7 | 0.0005 | < 0.0005 | mg/L | EFA | 09/12/14 | 1417 |
| Total Cadmium | 200.7 | 0.0005 | < 0.0005 | mg/L | EFA | 09/12/14 | 1417 |
| Total Chromium | 200.7 | 0.001 | < 0.001 | mg/L | EFA | 09/12/14 | 1417 |
| Total Copper | 200.7 | 0.002 | 0.013 | mg/L | EFA | 09/12/14 | 1417 |
| Total Lead | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 09/12/14 | 1417 |
| Total Nickel | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 09/12/14 | 1417 |
| Total Mercury | 245.1 | 0.0002 | < 0.0002 | mg/L | PEJ | 09/17/14 | 1227 |
| Total Silver | 200.7 | 0.001 | < 0.001 | mg/L | EFA | 09/12/14 | 1417 |
| Total Selenium | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 09/12/14 | 1417 |
| Total Thallium | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 09/12/14 | 1417 |
| Total Zinc | 200.7 | 0.005 | 0.038 | mg/L | EFA | 09/12/14 | 1417 |
| Hardness | *2340B | 0.331 | 41.4 | mg/L | EFA | 09/12/14 | 1417 |
| Cyanide | 335.4 | 0.005 | < 0.005 | mg/L | ARC | 09/11/14 | 1544 |
| Phenols | 420.4 | 0.02 | < 0.02 | mg/L | PEJ | 09/10/14 | 1554 |
| Semi-Volatiles | | | | | | | |
| Phenanthrene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 2,4-Dinitrotoluene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Fluorene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 4-Chlorophenyl phenyl ether | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Diethyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 1,2,-Diphenylhydrazine | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| N-nitroso-di-phenylamine | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Butyl benzyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 4-Bromophenyl phenyl ether | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Anthracene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| di-n-Butyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |

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SAMPLE ID: BOYKIN EFF SAMPLE NO: 14-13493

| | Method | JRA | D l4 | T7 | Amalasat | Data | Т: |
|------------------------------|--------|-----|--------|------|----------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Semi-Volatiles | | | | | | | |
| Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Pyrene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Benzidine | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Acenaphthene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| N-Nitrosodimethylamine | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| N-Nitroso-di-n-propylamine | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Hexachloroethane | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 1,2,4-Trichlorobenzene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Hexachlorobutadiene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Hexachlorocyclopentadiene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 2-Chloronaphthalene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Hexachlorobenzene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Bis(2-chloroisopropyl) ether | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Bis(2-chloroethyl) ether | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 2,6-Dinitrotoluene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Nitrobenzene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Isophorone | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Bis(2-chloroethoxy)methane | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Naphthalene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Acenaphthylene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Dimethyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 3,3-Dichlorobenzidine | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 2,4-Dinitrophenol | 625 | 20 | < 20 | ug/L | CLH | 09/17/14 | 0318 |
| Benzo[a]Anthracene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Chrysene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Pentachlorophenol | 625 | 10 | < 10 | ug/L | CLH | 09/17/14 | 0318 |
| 4-Nitrophenol | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 2,4,6-Trichlorophenol | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 4-Chloro 3-Methylphenol | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 2,4-Dichlorophenol | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 2,4-Dimethylphenol | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 2-Nitrophenol | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Phenol | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Benzo[b]Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Bis(2-ethylhexyl) phthalate | 625 | 5 | 8 | ug/L | CLH | 09/17/14 | 0318 |
| 4,6 Dinitro-o-cresol | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| 2-Chlorophenol | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Di-n-Octyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Benzo[k]Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Benzo[a]Pyrene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Indeno[1,2,3-c,d]Pyrene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Dibenz[a,h]Anthracene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Benzo[g,h,i]Perylene | 625 | 5 | < 5 | ug/L | CLH | 09/17/14 | 0318 |
| Volatiles | | | | | | | |

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SAMPLE ID: BOYKIN EFF SAMPLE NO: 14-13493

| | Method | JRA | | | | | |
|------------------------------------|--------|-----|--------|------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Volatiles | | | | | | | |
| Benzene | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| 1,2-Dichlorobenzene | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Chlorobenzene/Monochlorobenzene | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Bromoform | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Tetrachloroethene | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Toluene | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| 2-Chloroethyl vinyl ether | 624 | 10 | < 10 | ug/L | SDT | 09/10/14 | 1328 |
| Ethylbenzene | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| 1,4-Dichlorobenzene | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Acrolein | 624 | 50 | < 50 | ug/L | SDT | 09/10/14 | 1328 |
| 1,3-Dichloropropene(cis & trans) | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| 1,3-Dichlorobenzene | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| 1,1,2-Trichloroethane | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Methylene Chloride/Dichloromethane | e 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Acrylonitrile | 624 | 50 | < 50 | ug/L | SDT | 09/10/14 | 1328 |
| 1,2-Dichloroethane | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| trans-1,2-Dichloroethene | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Chloromethane (Methyl Chloride) | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Bromomethane | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Vinyl Chloride | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Chloroethane | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| 1,1-Dichloroethane | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Chloroform | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Dibromochloromethane | 624 | 5 | 6 | ug/L | SDT | 09/10/14 | 1328 |
| 1,1,1-Trichloroethane | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Carbon Tetrachloride | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Bromodichloromethane | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| 1,1,2,2-Tetrachloroethane | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| 1,2-Dichloropropane | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| Trichloroethene | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |
| 1,1-Dichloroethene | 624 | 5 | < 5 | ug/L | SDT | 09/10/14 | 1328 |

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SAMPLE ID: BOYK

BOYKIN EFF

SAMPLE NO: 14-13493

Method JRA
Parameter Number QL Result Unit Analyst Date Time

NOTES:

JRA Quantification Level is the concentration of the lowest calibration standard above zero with a reliable signal.

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The results on this report relate only to the sample(s) provided for analysis.

Results conform to NELAC standards, where applicable, unless otherwise indicated.

*SM 1997, **SM 2001

Authorized By: Maine (Radiche

Elaine Claiborne, Laboratory Director

Date: 19-Sep-14





CHAIN OF CUSTODY

| | * Metals: St **Part D | Not for Compliance | for Compliance | Received By: | Relinquished By: | Received By: | Sampled By: | | *WW= Wastewater, GW = | | | | | | | | G & | w it | 86 | | JRA Sample S | | Project ID: I | | Address: | Results To: | Company Contact: Dennis Beale | _ company Name: _ | | |
|---------------|--|-------------------------|---|--|---------------------------------|------------------|--|----------|--|---|--------------|--------|-----------|----------|----------|-----------|------------|------------|----------------|------------------|------------------|----------------|----------------------------------|--|--|---------------------------------------|-------------------------------|---|----------|--------------------|
| | * Metals: Sb, As, Be, Cd, Cr, Cu, Pb, Ni, Hg, Ag, Se, Tl, Zn **Part D | | _ | Mindelpall | Jan 6 | 70-50 | Case towie | > | *WW= Wastewater, GW = Groundwater, DW - Drinking Water, HW - Hazardous Waste | | | | | | | | Bookin SEE | Ruskin SCF | 130 11:00 2/04 | | Sample I ocation | | Project ID: Boykins WWP (Part D) | | Address: 1/28/ Pittman Road, Boykins, VA 23827 | Results To: Dennis Beale | Dennis Beale | Company Name: Southampton County Public Utilities |) | |
| | b, Ni, Hg, | | | | | C111173 / | | | Water, HV | | | | | | | 17 1-1 | 5 9.10 | 4-4-19 | ١ | Date | | | rtD) | | oykins, V | | Te | ublic Utili | | |
| | Ag, Se, | | | | | 110311 | | | V - Hazardo | | | | | | | 0106 | | 0706 | - | Time | Composite | | | | A 23827 | . Fax: | Telephone: | ties | | |
| | TI, Zn | | 1 | Date/Time: | Date/Time: | Date/Time: | Date/Time: | 20 44000 | us Waste | | | | | | | 1-4-1-1 | 5 1 151 | 41.47 | 1 | Date | T e | | | | | Fax: 757-654-6025 | 757-653-9269 | | | |
| | | | | 41.30 | Date/Time: (3 - 15 - 2) + | Date/Time: %-/- | 1-11-14 h1-11-3 | | OTHEBS | | | | | | | 1706 | 7 | 100 |) | Time | - | | | | | -6025 | -9269 | | | |
| | | | | | * | 1 | | | | | | | | | | | 1 | | 9-414 | Date | Grab | • | • | • | • | • | 1 | | | |
| | | | | いんが | いまい | 540 | | | | | | | | | | | | | 15/5 | Time | | | | | | | | | | |
| | | | | | | | | | | | | | | | | 7. | 1 | | | Total # of cont. | | | | | | | rieselv. | | Bottle 5 | |
| ~ | | | , | n N | | | | | | L | 111 | | HA | | | | | < 6 | X | Metals | *, & | Har | dnes | s (C | CaC | O3) | | <u>ا</u> : | | |
| Arrival Temp: | 0 (0 | CN I | J = Na2O2O3 | | # # # | 2 = HNO3 | $\frac{Preservatives}{1 = <6^{\circ}C 6 =$ | | L | _ | $oxed{oxed}$ | _ | h12 | <u> </u> | _ | #1 | L | | × | Cyanic | le *(I | nter | fere | nce | ch | eck) | <u>-</u> , (| 1 | D | |
| Temp | Sulfide: Oxidizin | terfer | 2O2O3 | 유 | 8 °0S | , 7 | 122 | | L | L | | B | 1≲2: | 125 | 4 | | L | > | × | Pheno | lics | | | | | | α | , (| 2 | |
| × | Sulfide: Oxidizing Agent: | *CN Interference Check: | | 4 = NaOH 9 = NH4CI | $3 = H_2SO_4 8 = H_2SO_4 + FAS$ | 7 = NaOH + ZnOAc | $\frac{\text{ves.}}{6 = \text{Na}_2\text{S}_2\text{O}_3 + \text{HCI}}$ | | L | | | | | | | | | > | × | Volatile | es (6 | 24)* | * | | | | | 7-10 | 2 | ≥ |
| Ü | | <mark>앉</mark> | | | + FAS | + ZnOA₁ |) ₃ + HCI | | - | _ | | | | | | Ĭ, | _ | > | * : | Semivo | | es B | NAs | (62 | (5)** | | <u> </u> - | 7-17 | | ANALYSES REOLECTED |
| 1 | 11 | Po | | | | n | | | - | _ | | | | | | て. | - | \perp | + | Bog | 1 | | | | | · · · · · · · · · · · · · · · · · · · | _ | - | | SILV |
| 1 | | Positive | 14= | 13= | 12= | <u> </u> | 10= | | _ | | | | | - | | $\dot{-}$ | _ | + | + | TSC | | | | | · | | \perp | 1 | 1 | D T C |
| റ് | | Negative | 14=Na ₂ SO ₃ + H ₂ SO ₄ | 13=Na ₂ SO ₃ + HCI | 12=Zinc Acetate + NaOH | 11=HCI | 10=Ascorbic Acid + HCI | | | | | | | \dashv | \dashv | | | + | + | | | ~ 1 | · | | | | - | _ | | I I I |
| | 1 } | tive | 3 + H25 | 3 + HC | cetate | | ic Acid | | | | | | \exists | | | | | T | \dagger | | | | | ***** | | | \dagger | \vdash | | ה כ |
| | | | \$O. | ± | + NaC | | 1+ HO | | | | | | | | | | | | _ | | | | | | | | T | | | |
| | | | | | Ĭ | | - | | | | | \int | \bot | \prod | I | \int | | | | | | | | | | | | | | |
| | | | | | | | | - | - | + | _ | + | \dashv | 1 | - | - | | | - | | | | | ······································ | , | | | | | |

JAMES R. REED and ASSOCIATES (757) 873-4703; FAX (757) 873-1498

CLIENT:

Southampton County

ATTN:

Dennis E. Beale

ADDRESS: 24283 Old Bridge Road Courtland, VA 23837

(757) 653-9269/653-8187cell

FAX:

PHONE:

e: dbeale@southamptoncounty.org

Special Notes: RE: BOYKINS WWP (PARD D) - WASTEWATER

GRAB COLLECTION: Date: 11/25/2014

Time: 1515

COMPOSITE COLLECTION:

Start Date: 11/25/14 Time: 0710

SAMPLE COLLECTED BY: CLIENT

End Date: 11/25/14 Time: 1510

SAMPLE RECEIPT:

PICK UP BY: REED - DB

Date: 11/26/2014

Time: 1425

NUMBER OF CONTAINERS: 7

SAMPLE CONDITION: Good Other (See C-O-C)

REPORT NO: 14-18284 14:22

SAMPLE ID:

BOYKIN EFF

SAMPLE NO: 14-18284

| | Method | JRA | | | | | |
|------------------------------|--------|--------|----------|------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Total Antimony | 200.7 | 0.005 | 0.037 | mg/L | EFA | 12/05/14 | 1317 |
| Total Arsenic | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 12/05/14 | 1317 |
| Total Beryllium | 200.7 | 0.0005 | < 0.0005 | mg/L | EFA | 12/05/14 | 1317 |
| Total Cadmium | 200.7 | 0.0005 | < 0.0005 | mg/L | EFA | 12/05/14 | 1317 |
| Total Chromium | 200.7 | 0.001 | < 0.001 | mg/L | EFA | 12/05/14 | 1317 |
| Total Copper | 200.7 | 0.002 | 0.012 | mg/L | EFA | 12/05/14 | 1317 |
| Total Lead | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 12/05/14 | 1317 |
| Total Nickel | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 12/05/14 | 1317 |
| Total Mercury | 245.1 | 0.0002 | < 0.0002 | mg/L | PEJ | 12/04/14 | 1546 |
| Total Silver | 200.7 | 0.001 | < 0.001 | mg/L | EFA | 12/05/14 | 1317 |
| Total Selenium | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 12/05/14 | 1317 |
| Total Thallium | 200.7 | 0.005 | < 0.005 | mg/L | EFA | 12/05/14 | 1317 |
| Total Zinc | 200.7 | 0.005 | 0.044 | mg/L | EFA | 12/05/14 | 1317 |
| Hardness | *2340B | 0.331 | 41.0 | mg/L | EFA | 12/12/14 | 1114 |
| Cyanide | 335.4 | 0.005 | < 0.005 | mg/L | ARC | 12/03/14 | 1439 |
| Phenols | 420.4 | 0.02 | < 0.02 | mg/L | PEJ | 12/03/14 | 1506 |
| Semi-Volatiles | | | | | | | |
| N-Nitroso-di-n-propylamine | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Acenaphthene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 2,6-Dinitrotoluene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Dimethyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Acenaphthylene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Naphthalene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Bis(2-chloroethoxy)methane | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Isophorone | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Nitrobenzene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Bis(2-chloroisopropyl) ether | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Bis(2-chloroethyl) ether | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| N-Nitrosodimethylamine | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Hexachlorobenzene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |

James R. Reed & Associates

770 Pilot House Drive, Newport News, VA 23606

(757) 873-4703 • Fax: (757) 873-1498



SAMPLE ID: BOYKIN EFF SAMPLE NO: 14-18284

| | Method | JRA | | | *************************************** | | |
|-----------------------------|--------|-----|--------|------|---|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Semi-Volatiles | | | | | | | |
| Pentachlorophenol | 625 | 10 | < 10 | ug/L | CLH | 12/04/14 | 0210 |
| Hexachlorocyclopentadiene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 2,4-Dinitrotoluene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Hexachloroethane | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 2-Chloronaphthalene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 1,2,4-Trichlorobenzene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Benzo[g,h,i]Perylene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 4,6 Dinitro-o-cresol | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 2,4-Dinitrophenol | 625 | 20 | < 20 | ug/L | CLH | 12/04/14 | 0210 |
| 4-Chloro 3-Methylphenol | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 2,4-Dichlorophenol | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 2,4-Dimethylphenol | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 2-Nitrophenol | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Benzo[b]Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 2-Chlorophenol | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 4-Nitrophenol | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Dibenz[a,h]Anthracene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Indeno[1,2,3-c,d]Pyrene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Fluorene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Benzo[a]Pyrene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Hexachlorobutadiene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Benzo[k]Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Phenol | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Anthracene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 4-Chlorophenyl phenyl ether | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Diethyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 1,2,-Diphenylhydrazine | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| N-nitroso-di-phenylamine | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 2,4,6-Trichlorophenol | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Phenanthrene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Di-n-Octyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| di-n-Butyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Fluoranthene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 3,3-Dichlorobenzidine | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| 4-Bromophenyl phenyl ether | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Bis(2-ethylhexyl) phthalate | 625 | 5 | 13 | ug/L | CLH | 12/04/14 | 0210 |
| Pyrene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Chrysene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Benzo[a]Anthracene | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Butyl benzyl phthalate | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Benzidine | 625 | 5 | < 5 | ug/L | CLH | 12/04/14 | 0210 |
| Volatiles | | | | | | | |
| 1,1-Dichloroethane | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Benzene | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |

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SAMPLE ID: BOYKIN EFF SAMPLE NO: 14-18284

| | Method | JRA | | | | | |
|-----------------------------------|--------|-----|--------|------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Volatiles | | | | | | | |
| Bromomethane | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Vinyl Chloride | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Chloroethane | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Methylene Chloride/Dichloromethan | e 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| 1,1-Dichloroethene | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Chloromethane (Methyl Chloride) | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Bromoform | 624 | 5 | 7 | ug/L | SDT | 12/01/14 | 1918 |
| trans-1,2-Dichloroethene | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| 1,4-Dichlorobenzene | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| 1,3-Dichlorobenzene | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| 1,2-Dichlorobenzene | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| 1,3-Dichloropropene(cis & trans) | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Acrylonitrile | 624 | 50 | < 50 | ug/L | SDT | 12/01/14 | 1918 |
| Acrolein | 624 | 50 | < 50 | ug/L | SDT | 12/01/14 | 1918 |
| Ethylbenzene | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Chlorobenzene/Monochlorobenzene | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Dibromochloromethane | 624 | 5 | 11 | ug/L | SDT | 12/01/14 | 1918 |
| Tetrachloroethene | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Chloroform | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| 2-Chloroethyl vinyl ether | 624 | 10 | < 10 | ug/L | SDT | 12/01/14 | 1918 |
| 1,1,2-Trichloroethane | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Trichloroethene | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| 1,2-Dichloropropane | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| 1,1,2,2-Tetrachloroethane | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Bromodichloromethane | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Carbon Tetrachloride | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| 1,1,1-Trichloroethane | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| 1,2-Dichloroethane | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |
| Toluene | 624 | 5 | < 5 | ug/L | SDT | 12/01/14 | 1918 |

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SAMPLE ID: BOYKIN EFF SAMPLE NO: 14-18284

. Signal Branch

| | Method | JRA | | | | | |
|-----------|--------|-------------|--------|------|---------|------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| | | | | | | | |

NOTES:

JRA Quantification Level is the concentration of the lowest calibration standard above zero with a reliable signal.

Reproduction of this report is not permitted, except in full, without written approval from James R Reed & Associates.

The results on this report relate only to the sample(s) provided for analysis.

Results conform to NELAC standards, where applicable, unless otherwise indicated.

*SM 1997

Authorized By: Plaine Clark

Elaine Claiborne, Laboratory Director

Date: 15-Dec-14



| Form Approve | d 1/14/99 |
|--------------|-----------|
| OMB Number | 2040-0086 |

FACILITY NAME AND PERMIT NUMBER:

Town of Boykins WWTP VA 0026417

SUPPLEMENTAL APPLICATION INFORMATION

PART E. TOXICITY TESTING DATA

POTWs meeting one or more of the following criteria must provide the results of whole effluent toxicity tests for acute or chronic toxicity for each of the facility's discharge points: 1) POTWs with a design flow rate greater than or equal to 1.0 mgd; 2) POTWs with a pretreatment program (or those that are required to have one under 40 CFR Part 403); or 3) POTWs required by the permitting authority to submit data for these parameters.

- At a minimum, these results must include quarterly testing for a 12-month period within the past 1 year using multiple species (minimum of two species), or the results from four tests performed at least annually in the four and one-half years prior to the application, provided the results show no appreciable toxicity, and testing for acute and/or chronic toxicity, depending on the range of receiving water dilution. Do not include information on combined sewer overflows in this section. All information reported must be based on data collected through analysis conducted using 40 CFR Part 136 methods. In addition, this data must comply with QA/QC requirements of 40 CFR Part 136 and other appropriate QA/QC requirements for standard methods for analytes not addressed by 40 CFR Part 136.
- In addition, submit the results of any other whole effluent toxicity tests from the past four and one-half years. If a whole effluent toxicity
 test conducted during the past four and one-half years revealed toxicity, provide any information on the cause of the toxicity or any results
 of a toxicity reduction evaluation, if one was conducted.

| test conducted during the past four and one-hair years revealed toxicity, provide any information on the cause of the toxicity of any results of a toxicity reduction evaluation, if one was conducted. If you have already submitted any of the information requested in Part E, you need not submit it again. Rather, provide the information requested in question E.4 for previously submitted information. If EPA methods were not used, report the reasons for using alternate methods. If test summaries are available that contain all of the information requested below, they may be submitted in place of Part E. If no biomonitoring data is required, do not complete Part E. Refer to the Application Overview for directions on which other sections of the form to complete. | | | | | | |
|--|---|--|--|--|--|--|
| E.1. Required Tests. | | | | | | |
| Indicate the number of whole effluent toxicity tests conducted in the past four and one-half years. acute | | | | | | |
| E.2. Individual Test Data. Complete the column per test (where each species | following chart <u>for each whole efflue</u> constitutes a test). Copy this page | ent toxicity test conducted in the last for if more than three tests are being repo | our and one-half years. Allow one orted. | | | |
| , , , | Test number: | Test number: | Test number: | | | |
| a. Test information. | | | | | | |
| Test species & test method number | | | | | | |
| Age at initiation of test | | | | | | |
| Outfall number | | | | | | |
| Dates sample collected | | | | | | |
| Date test started | | | | | | |
| Duration | | | | | | |
| b. Give toxicity test methods follower | ed. | | | | | |
| Manual title | | | | | | |
| Edition number and year of publication | | | | | | |
| Page number(s) | | | | | | |
| c. Give the sample collection method(s) used. For multiple grab samples, indicate the number of grab samples used. | | | | | | |
| 24-Hour composite | | | | | | |
| Grab | | | | | | |
| d. Indicate where the sample was taken in relation to disinfection. (Check all that apply for each) | | | | | | |
| Before disinfection | | | | | | |
| After disinfection | | | | | | |
| After dechlorination | | | | | | |

| 1 | | |
|---|----------------------------------|---|
| | FACILITY NAME AND PERMIT NUMBER: | Form Approved 1/14/99 OMB Number 2040-008t |
| | Town of Boykins WWTP VA 0026417 | ONE Namber 2040 000. |

| • | | | | | | | |
|---|--|--------------------------------------|--------------|--|--|--|--|
| | Test number: | Test-number: | Test number: | | | | |
| e. Describe the point in the treatment process at which the sample was collected. | | | | | | | |
| Sample was collected: | | | | | | | |
| f. For each test, include whether the | e test was intended to assess chronic | c toxicity, acute toxicity, or both. | | | | | |
| Chronic toxicity | | | | | | | |
| Acute toxicity | | | | | | | |
| g. Provide the type of test performe | d. | | | | | | |
| Static | | | | | | | |
| Static-renewal | | | | | | | |
| Flow-through | | | | | | | |
| h. Source of dilution water. If labora | atory water, specify type; if receiving | water, specify source. | | | | | |
| Laboratory water | | | | | | | |
| Receiving water | | | | | | | |
| i. Type of dilution water. It salt water | er, specify "natural" or type of artificia | al sea salts or brine used. | | | | | |
| Fresh water | | | | | | | |
| Salt water | | | | | | | |
| j. Give the percentage effluent used | for all concentrations in the test ser | ies. | | | | | |
| | | | | | | | |
| | | | | | | | |
| | | | | | | | |
| k. Parameters measured during the | test. (State whether parameter mee | ts test method specifications) | | | | | |
| рН | | | | | | | |
| Salinity | | | | | | | |
| Temperature | | | | | | | |
| Ammonia | | | | | | | |
| Dissolved oxygen | | | | | | | |
| I. Test Results. | | | | | | | |
| Acute: | | | | | | | |
| Percent survival in 100% effluent | % | % | % | | | | |
| LC ₅₀ | | | | | | | |
| 95% C.I. | % | % | % | | | | |
| Control percent survival | % | % | % | | | | |
| Other (describe) | | | | | | | |
| | | | | | | | |

| FACILITY NAME AND PERMIT NUMBE | R: | | Form Approved 1/14/99 OMB Number 2040-0086 | | | |
|--|--|--|---|--|--|--|
| Town of Boykins WWTP VA 0026417 | | | | | | |
| Chronic: | | | | | | |
| NOEC | % | % | % | | | |
| IC ₂₅ | % | % | % | | | |
| Control percent survival | . % | % | % | | | |
| Other (déscribe) | | | | | | |
| m. Quality Control/Quality Assuran | ce. | | | | | |
| Is reference toxicant data available? | | | | | | |
| Was reference toxicant test within acceptable bounds? | | | | | | |
| What date was reference toxicant test run (MM/DD/YYYY)? | | | | | | |
| Other (describe) | | | | | | |
| E.3. Toxicity Reduction Evaluation. Is | the treatment works involved in a To | xicity Reduction Evaluation? | | | | |
| Yes_✓ No If yes, | describe: | | | | | |
| E.4. Summary of Submitted Biomonito cause of toxicity, within the past fou summary of the results. | ring Test Information. If you have r and one-half years, provide the dat | submitted biomonitoring test informations the information was submitted to the | ion, or information regarding the ne permitting authority and a | | | |
| Date submitted: | (MM/DD/YYYY) | | | | | |
| Summary of results: (see instructio | ns) | | | | | |
| Summary of Test Results Attac | | | | | | |
| | | | | | | |
| | END OF PA | ADT E | | | | |
| REFER TO THE APPLICA | | | ER PARTS OF FORM | | | |

2A YOU MUST COMPLETE.

CUMULATIVE DATA SUMMARY

Boykins WWTP

NPDES: VA0026417

Outfall 001

| Date of | Invertebrate | Vertebrate | Invertebrate | Vertebrate |
|------------|--------------|------------|--------------|------------|
| Test | LC50 % | LC50 % | NOEC % | NOEC % |
| *12/10/0' | 7 | | | 12% |
| *7/21/2008 | 3 | | | 49% |
| 11/9/2009 | | | | 24% |
| 3/1/2010 | | | | 49% |
| 6/7/2010 | | | | 100% |
| 9/27/2010 | | | | 49% |
| 2/7/2011 | 1 | | | 24% |
| 6/20/2011 | | | | 100% |
| 8/15/2011 | | | | 24% |
| 10/10/2011 | | | · | 49% |
| 1/30/2012 | 2 | | · | 24% |
| 4/30/2012 | 2 | | | 49% |
| 7/16/2012 | | | | 6% |
| 11/12/2012 | 2 | | | 12% |
| 2/11/2013 | 3 | | | 24% |
| 5/6/2013 | 3 | | | 49% |
| 8/19/2013 | 3 | | | 6% |
| 10/14/2013 | 3 | | | 100% |
| 2/10/2014 | | | | 24% |
| 5/12/2014 | + | | | 49% |
| 9/15/2014 | | | | <6% |
| 12/15/2014 | | | | <6% |
| 2/19/15** | | | | 6% |
| 2/19/15*** | | | | 6% |
| 3/23/2015 | | | | 12% |

^{*}non-compliance test

^{**} Clarifier (15-02513)

*** Filtered effluent (15-02512)

Form Approved 1/14/99 OMB Number 2040-0086

FACILITY NAME AND PERMIT NUMBER:

Town of Boykins WWTP VA 0026417

| sui | PPLEMENTAL | APPLICATION INFORMATION |
|--------|---|---|
| All tr | | RIAL USER DISCHARGES AND RCRA/CERCLA WASTES ving discharges from significant industrial users or which receive RCRA, CERCLA, or other remedial wastes must |
| GEN | IERAL INFORMA | TION: |
| F.1. | Pretreatment Progra | m. Does the treatment works have, or is it subject to, an approved pretreatment program? |
| | ✓_YesNo | |
| F.2. | Number of Significa of industrial users tha | Int Industrial Users (SIUs) and Categorical Industrial Users (CIUs). Provide the number of each of the following types to the treatment works. |
| | a. Number of non-ca | ategorical SIUs. 1 |
| | b. Number of CIUs. | 0 |
| | | |
| | | TRIAL USER INFORMATION: |
| | | rmation for each SIU. If more than one SIU discharges to the treatment works, copy questions F.3 through F.8 on requested for each SIU. |
| | | I User Information. Provide the name and address of each SIU discharging to the treatment works. Submit additional |
| | Name: | AEC Virginia, LLC |
| | Mailing Address: | 32056 East Circle Boykins, VA. 23827 |
| F.4. | Industrial Processes | s. Describe all of the industrial processes that affect or contribute to the SIU's discharge. |
| | Textile dying & fini | |
| F.5. | Principal Product(s) discharge. | and Raw Material(s). Describe all of the principal processes and raw materials that affect or contribute to the SIU's |
| | Principal product(s): | Government Commercial Webbing |
| | Raw material(s): | Nylon,Polyester, Kevlar |
| F.6. | Flow Rate. | |
| | per day (gpd) and | ter flow rate. Indicate the average daily volume of process wastewater discharged into the collection system in gallons whether the discharge is continuous or intermittent. |
| | 75,000 | gpd (continuous orintermittent) |
| | system in gallons | tewater flow rate. Indicate the average daily volume of non-process wastewater flow discharged into the collection per day (gpd) and whether the discharge is continuous or intermittent. |
| | 1200 | gpd (continuous orintermittent) |
| F.7. | Pretreatment Standa | ards. Indicate whether the SIU is subject to the following: |
| | a. Local limits | No |
| | b. Categorical pretre | |
| | If subject to categoric | al pretreatment standards, which category and subcategory? |

| FACILITY NAME AND PERMIT NUMBER: | | | Form Approved 1/14/99 OMB Number 2040-0086 | | | |
|----------------------------------|------------|--|---|--|--|--|
| Town | of E | Boykins WWTP VA 0026417 | ONID Number 2040-0000 | | | |
| F.8. | Pro ups | blems at the Treatment Works Attributed to Waste Discharged by the lets, interference) at the treatment works in the past three years? | e SIU. Has the SIU caused or contributed to any problems (e.g., | | | |
| | | YesNo If yes, describe each episode. | | | | |
| | Ιh | e industry and the WWTP have both encountered Toxicity issues | at the same time. | | | |
| | | | | | | |
| DCE | · A L | AZARDOUS WASTE RECEIVED BY TRUCK, RAIL, OR DEDIC | ATED PIPELINE | | | |
| | RCI | RA Waste. Does the treatment works receive or has it in the past three ye?Yes ✓ No (go to F.12.) | | | | |
| E 10 | Wa | ste Transport. Method by which RCRA waste is received (check all that | t apply): | | | |
| 1.10. | *** | Truck RailDedicated Pipe | , wee, 17) | | | |
| | | | | | | |
| F.11. | Wa | ste Description. Give EPA hazardous waste number and amount (volume | me or mass, specify units). | | | |
| | EP/ | A Hazardous Waste Number Amount | <u>Units</u> | | | |
| | | | *************************************** | | | |
| | | *************************************** | • | | | |
| | | | | | | |
| CER | CLA | A (SUPERFUND) WASTEWATER, RCRA REMEDIATION/CORI | RECTIVE WATER: | | | |
| F.12 | Re | mediation Waste. Does the treatment works currently (or has it been no | tified that it will) receive waste from remedial activities? | | | |
| | | Yes (complete F.13 through F.15.) ✓ No | | | | |
| | Pro | ovide a list of sites and the requested information (F.13 - F.15.) for each c | current and future site. | | | |
| | | | | | | |
| F.13 | | iste Origin. Describe the site and type of facility at which the CERCLA/R he next five years). | CRA/or other remedial waste originates (or is expected to originate | | | |
| | nı u | ne next live years). | | | | |
| | | | | | | |
| | | | | | | |
| | | | | | | |
| F.14 | Po | llutants. List the hazardous constituents that are received (or are expect | ed to be received). Include data on volume and concentration, if | | | |
| | kno | own. (Attach additional sheets if necessary). | | | | |
| | | | | | | |
| | | | | | | |
| - 4 | 184- | | | | | |
| F.15 | | iste Treatment. | works? | | | |
| | a. | Is this waste treated (or will it be treated) prior to entering the treatment v | AOIK2 : | | | |
| | | YesNo | | | | |
| | | If yes, describe the treatment (provide information about the removal effi | ciency): | | | |
| | | | | | | |
| | | | | | | |
| | b. | Is the discharge (or will the discharge be) continuous or intermittent? | | | | |
| | ٠. | | escribe discharge schedule. | | | |
| | | | | | | |
| | | | | | | |
| l | | END OF DAD | TE | | | |

END OF PART F.
REFER TO THE APPLICATION OVERVIEW TO DETERMINE WHICH OTHER PARTS OF FORM
2A YOU MUST COMPLETE

Additional information, if provided, will appear on the following pages.

NPDES FORM 2A Additional Information

Town of Boykins WWTP VA0026417

Part B. - Question B.4

Waste Management Inc. 3474 Atlantic Lane Waverly, VA 23890

DEQ Permit Number: 562

(804) 474-8574

Southeastern Public Service Authority 723 Woodlake Drive Chesapeake, VA. 23320

Permit Number: 417

(757) 420-4700

Note: Locations listed above are not currently utilized for sludge disposal.

VPDES SEWAGE SLUDGE PERMIT APPLICATION FORM

SCREENING INFORMATION

This application is divided into sections. Sections A pertain to all applicants. The applicability of Sections B, C and

| | | our facility's sewage sludge use or disposal practices. The information provided on this page will help you ch sections to fill out. | | | | |
|----|--------|--|--|--|--|--|
| 1. | All ap | plicants must complete Section A (General Information). | | | | |
| 2. | Will t | his facility generate sewage sludge? _x_YesNo | | | | |
| | Will t | his facility derive a material from sewage sludge?Yes _xNo | | | | |
| | • | answered Yes to either, complete Section B (Generation Of Sewage Sludge Or Preparation Of A Material ed From Sewage Sludge). | | | | |
| 3. | Will t | his facility apply sewage sludge to the land?Yes _xNo | | | | |
| | Will s | ewage sludge from this facility be applied to the land? x_YesNo | | | | |
| | If you | If you answered No to both questions above, skip Section C. | | | | |
| | If you | If you answered Yes to either, answer the following three questions: | | | | |
| | a. | Will the sewage sludge from this facility meet the ceiling concentrations, pollutant concentrations, Class A pathogen reduction requirements and one of the vector attraction reduction requirements 1-8, as identified in the instructions? YesNo Unknown | | | | |
| | b. | Will sewage sludge from this facility be placed in a bag or other container for sale or give-away for application to the land? x_YesNo | | | | |
| | c. | Will sewage sludge from this facility be sent to another facility for treatment or blending?Yes x No | | | | |
| | lf you | If you answered No to all three, complete Section C (Land Application Of Bulk Sewage Sludge). | | | | |
| | lf you | answered Yes to a, b or c, skip Section C. | | | | |
| 4. | Do yo | Do you own or operate a surface disposal site?Yes _x_No | | | | |
| | If Yes | If Yes, complete Section D (Surface Disposal). | | | | |

SECTION A. GENERAL INFORMATION

All applicants must complete this section. Facility Information. Facility name: Boykins WWTP a. b. Contact person: Michael W. Johnson Title: County Administrator Phone: (757) 653-3015 Mailing address: c. Street or P.O. Box: P.O. Box 400 __ State: VA.____Zip: 23837 City or Town: Courtland_____ d. Facility location: Street or Route #: 19028 Number 8 Schoolhouse Road County: Southampton City or Town:Boykins_____ State: VA. Zip:23827 Is this facility a Class I sludge management facility? ___Yes _x_No e. f. Facility design flow rate: 0.59 Total population served: g. h. Indicate the type of facility: x Publicly owned treatment works (POTW) ___ Privately owned treatment works ___ Federally owned treatment works ___ Blending or treatment operation ___ Surface disposal site ___ Other (describe): Applicant Information. If the applicant is different from the above, provide the following: 2. Applicant name: a. Mailing address: b. Street or P.O. Box: City or Town: _____ State: ____ Zip: Contact person: c. Title: Phone: () Is the applicant the owner or operator (or both) of this facility? d. x_owner ____x_operator Should correspondence regarding this permit be directed to the facility or the applicant? (Check one) e. <u>x</u> applicant _____ facility 3. Permit Information. Facility's VPDES permit number (if applicable): VA0026417 a. List on this form or an attachment, all other federal, state or local permits or construction approvals received b. or applied for that regulate this facility's sewage sludge management practices: Type of Permit: Permit Number: VA0026417 **NPDES** Indian Country. Does any generation, treatment, storage, application to land or disposal of sewage sludge from this 4.

facility occur in Indian Country? Yes x No If yes, describe:

- 5. Topographic Map. Provide a topographic map or maps (or other appropriate maps if a topographic map is unavailable) that shows the following information. Maps should include the area one mile beyond all property boundaries of the facility: Appendix 5
 - a. Location of all sewage sludge management facilities, including locations where sewage sludge is generated, stored, treated, or disposed.
 - b. Location of all wells, springs, and other surface water bodies listed in public records or otherwise known to the applicant within 1/4 mile of the property boundaries.
- 6. Line Drawing. Provide a line drawing and/or a narrative description that identifies all sewage sludge processes that will be employed during the term of the permit including all processes used for collecting, dewatering, storing, or treating sewage sludge, the destination(s) of all liquids and solids leaving each unit, and all methods used for pathogen reduction and vector attraction reduction. Appendix 6
- 7. Contractor Information. Are any operational or maintenance aspects of this facility related to sewage sludge generation, treatment, use or disposal the responsibility of a contractor? _x_Yes ___No If yes, provide the following for each contractor (attach additional pages if necessary). Name:McGill Environmental Systems

 Mailing address: 5056 Beef Steak Road

Street or P.O. Box:

City or Town: Waverly _____ State: VA. ___ Zip:23890

Phone: (757) 647-6052

 Contractor's Federal, State or Local Permit Number(s) applicable to this facility's sewage sludge: Permit No. VPA00837

If the contractor is responsible for the use and/or disposal of the sewage sludge, provide a description of the service to be provided to the applicant and the respective obligations of the applicant and the contractor(s). Accepts sludge for disposal at the facility

8. Pollutant Concentrations. Using the table below or a separate attachment, provide sewage sludge monitoring data for the pollutants which limits in sewage sludge have been established in 9 VAC 25-31-10 et seq. for this facility's expected use or disposal practices. All data must be based on three or more samples taken at least one month apart and must be no more than four and one-half years old. (See Attachment)

| POLLUTANT | CONCENTRATION (mg/kg dry weight) | SAMPLE DATE | ANALYTICAL METHOD | DETECTION LEVEL FOR ANALYSIS |
|------------|----------------------------------|----------------|----------------------|---------------------------------|
| Arsenic | | | | |
| Cadmium | | | | |
| Chromium | | | | |
| Copper | | | | |
| Lead | | | | |
| Mercury | | | | |
| Molybdenum | | | | |
| Nickel | | | | |
| Selenium | | | | |
| Zinc | | | | |

| 9. | Certification. Read and submit the following certification statement with this application. Refer to the instructions to |
|----|--|
| | determine who is an officer for purposes of this certification. Indicate which parts of the application you have |
| | completed and are submitting: |

| _xSection | A (General Information) | | |
|-----------|---|-------------|---------|
| x Section | B (Generation of Sewage Sludge or Preparation of a Material Derived | from Sewage | Sludge) |
| Section | C (Land Application of Bulk Sewage Sludge) | | |
| Section | D (Surface Disposal) | | |

| ACILITY NAME: Boykins WWTP | VPDES PERMIT NUMBER: VA0026417 |
|----------------------------|--------------------------------|
| | |

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, the information is, to the best of my knowledge and belief, true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Name and official title

Signature / Www 6 lb

Date Signed MAY 7, Zo15

Telephone number (757) 653-3015

Upon request of the department, you must submit any other information necessary to assess sewage sludge use or disposal practices at your facility or identify appropriate permitting requirements.

SECTION B. GENERATION OF SEWAGE SLUDGE OR PREPARATION OF A MATERIAL DERIVED FROM SEWAGE SLUDGE

Complete this section if your facility generates sewage sludge or derives a material from sewage sludge Amount Generated On Site. 1. Total dry metric tons per 365-day period generated at your facility: 74 dry metric tons Amount Received from Off Site. If your facility receives sewage sludge from another facility for treatment, use or disposal, provide the following information for each facility from which sewage sludge is received. If you receive sewage sludge from more than one facility, attach additional pages as necessary. Facility name: Contact Person: b. Title: Phone () Mailing address: c. Street or P.O. Box: State: Zip: City or Town: d. Facility Address: (not P.O. Box) Total dry metric tons per 365-day period received from this facility: ____ dry metric tons e. Describe, on this form or on another sheet of paper, any treatment processes known to occur at the off-site f. facility, including blending activities and treatment to reduce pathogens or vector attraction characteristics: 3. Treatment Provided at Your Facility. Which class of pathogen reduction is achieved for the sewage sludge at your facility? x__Neither or unknown Class B Describe, on this form or another sheet of paper, any treatment processes used at your facility to reduce b. pathogens in sewage sludge: Which vector attraction reduction option is met for the sewage sludge at your facility? c. ___ Option 1 (Minimum 38 percent reduction in volatile solids) ___ Option 2 (Anaerobic process, with bench-scale demonstration) ___ Option 3 (Aerobic process, with bench-scale demonstration) ___Option 4 (Specific oxygen uptake rate for aerobically digested sludge) ___ Option 5 (Aerobic processes plus raised temperature) ___ Option 6 (Raise pH to 12 and retain at 11.5) ___ Option 7 (75 percent solids with no unstabilized solids) Option 8 (90 percent solids with unstabilized solids) x None or unknown Describe, on this form or another sheet of paper, any treatment processes used at your facility to reduce d. vector attraction properties of sewage sludge:Bardenpho-Oxidation Ditch, Aerobic Digestion, Dewatering by Centrifuge ,offsite disposal at Mc Gill Environmental Systems Describe, on this form or another sheet of paper, any other sewage sludge treatment activities, including e. blending, not identified in a - d above: None Preparation of Sewage Sludge Meeting Ceiling and Pollutant Concentrations, Class A Pathogen Requirements and One 4.N/A of Vector Attraction Reduction Options 1-8 (EQ Sludge). (If sewage sludge from your facility does not meet all of these criteria, skip Question 4.)

Total dry metric tons per 365-day period of sewage sludge subject to this section that is applied to the land:

| | | dry metric tons |
|-------|---------|---|
| | b. | ls sewage sludge subject to this section placed in bags or other containers for sale or give-away? YesNo |
| 5.N/A | Sale or | Give-Away in a Bag or Other Container for Application to the Land. |
| J.1 | | te this question if you place sewage sludge in a bag or other container for sale or give-away prior to land application. Skip this |
| | | if sewage sludge is covered in Question 4.) |
| | a. | Total dry metric tons per 365-day period of sewage sludge placed in a bag or other container at your facility for sale or give-away for application to the land: dry metric tons |
| | b. | Attach, with this application, a copy of all labels or notices that accompany the sewage sludge being sold or given away in a bag or other container for application to the land. |
| 6.N/A | Shipme | nt Off Site for Treatment or Blending. |
| | (Comple | te this question if sewage sludge from your facility is sent to another facility that provides treatment or blending. This question apply to sewage sludge sent directly to a land application or surface disposal site. Skip this question if the sewage sludge is in Questions 4 or 5. If you send sewage sludge to more than one facility, attach additional sheets as necessary.) |
| | a. | Receiving facility name: |
| | b. | Facility contact: |
| | | Title: |
| | _ | Phone: () |
| | c. | Mailing address: Street or P.O. Box: |
| | | City or Town: State: Zip: |
| | d. | Total dry metric tons per 365-day period of sewage sludge provided to receiving facility: dry |
| | | metric tons |
| | e. | List, on this form or an attachment, the receiving facility's VPDES permit number as well as the numbers of |
| | | all other federal, state or local permits that regulate the receiving facility's sewage sludge use or disposal |
| | | practices: Type of Permit: |
| | | Permit Number: Type of Permit: |
| | | |
| | f. | Does the receiving facility provide additional treatment to reduce pathogens in sewage sludge from your |
| | | facility?YesNo Which class of pathogen reduction is achieved for the sewage sludge at the receiving facility? |
| | | Class AClass BNeither or unknown |
| | | Describe, on this form or another sheet of paper, any treatment processes used at the receiving facility to |
| | | reduce pathogens in sewage sludge: |
| | | - a the state of the |
| | g. | Does the receiving facility provide additional treatment to reduce vector attraction characteristics of the sewage sludge?YesNo |
| | | Which vector attraction reduction option is met for the sewage sludge at the receiving facility? |
| | | Option 1 (Minimum 38 percent reduction in volatile solids) |
| | | Option 2 (Anaerobic process, with bench-scale demonstration) |
| | | Option 3 (Aerobic process, with bench-scale demonstration) |
| | | Option 4 (Specific oxygen uptake rate for aerobically digested sludge) |
| | | Option 5 (Aerobic processes plus raised temperature) |
| | | Option 6 (Raise pH to 12 and retain at 11.5) |
| | | Option 7 (75 percent solids with no unstabilized solids) Option 8 (90 percent solids with unstabilized solids) |
| | | None unknown |
| | | Describe, on this form or another sheet of paper, any treatment processes used at the receiving facility to |
| | | reduce vector attraction properties of sewage sludge: |
| | 1_ | Does the receiving facility provide any additional treatment or blending not identified in f or g above? |
| | h. | YesNo |
| | | If yes, describe, on this form or another sheet of paper, the treatment processes not identified in f or g above |
| | | 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 |

VPDES PERMIT NUMBER: VA0026417

FACILITY NAME: Boykins WWTP

| TY N | AME: Boykins WWTP VPDES PERMIT NUMBER: VA0026417 |
|-------|--|
| i. | If you answered yes to f., g or h above, attach a copy of any information you provide to the receiving facility to comply with the "notice and necessary information" requirement of 9 VAC 25-31-530.G. |
| j | Does the receiving facility place sewage sludge from your facility in a bag or other container for sale or give-away for application to the land?YesNo |
| k. | If yes, provide a copy of all labels or notices that accompany the product being sold or given away. Will the sewage sludge be transported to the receiving facility in a truck-mounted watertight tank normally used for such purposes? Yes No. If no, provide description and specification on the vehicle used to transport the sewage sludge to the receiving facility. Show the haul route(s) on a location map or briefly describe the haul route below and indicate the days of the week and the times of the day sewage sludge will be transported. |
| | |
| | Application of Bulk Sewage Sludge. |
| | plete Question 7.a if sewage sludge from your facility is applied to the land, unless the sewage sludge is covered in Questions 4, 5 or appliete Question 7.b, c & d only if you are responsible for land application of sewage sludge.) |
| a. | Total dry metric tons per 365-day period of sewage sludge applied to all land application sites:dry metric tons |
| b. | Do you identify all land application sites in Section C of this application?YesNo If no, submit a copy of the Land Application Plan (LAP) with this application (LAP should be prepared in accordance with the instructions). |
| c. | Are any land application sites located in States other than Virginia?YesNo If yes, describe, on this form or on another sheet of paper, how you notify the permitting authority for the States where the land application sites are located. Provide a copy of the notification. |
| d. | Attach a copy of any information you provide to the owner or lease holder of the land application sites to comply with the "notice and necessary" information requirement of 9 VAC 25-31-530 F and/or H (Examples may be obtained in Appendix IV). |
| Surfa | ace Disposal. |
| | plete Question 8 if sewage sludge from your facility is placed on a surface disposal site.) |
| à. | Total dry metric tons per 365-day period of sewage sludge from your facility placed on all surface disposal sites: dry metric tons |
| b. | Do you own or operate all surface disposal sites to which you send sewage sludge for disposal? Yes No |
| | If no, answer questions c - g for each surface disposal site that you do not own or operate. If you send sewage sludge to more than one surface disposal site, attach additional pages as necessary. |

Are any land application sites located in States other than c. If yes, describe, on this form or on another sheet of paper States where the land application sites are located. Prov Attach a copy of any information you provide to the own d. comply with the "notice and necessary" information requ may be obtained in Appendix IV). 8.N/A Surface Disposal. (Complete Question 8 if sewage sludge from your facility is placed on a surf Total dry metric tons per 365-day period of sewage slud sites: dry metric tons b. Do you own or operate all surface disposal sites to which Yes __No If no, answer questions c - g for each surface disposal sit sludge to more than one surface disposal site, attach add Site name or number: c. Contact person: d. Title: Phone: () Contact is: __Site Owner __Site operator Mailing address. e. Street or P.O. Box: State: Zip: City or Town:_ Total dry metric tons per 365-day period of sewage sludge from your facility placed on this surface disposal f. __ dry metric tons List, on this form or an attachment, the surface disposal site VPDES permit number as well as the numbers of

all other federal, state or local permits that regulate the sewage sludge use or disposal practices at the surface

Type of Permit:

disposal site:

Permit Number:

FACILITY NAME: Boykins WWTP

i.

j

k.

g.

7.N/A

| 9.N/A | Incine | ration. |
|-------|----------|---|
| | (Compl | cte Question 9 if sewage sludge from your facility is fired in a sewage sludge incinerator.) |
| | a. | Total dry metric tons per 365-day period of sewage sludge from your facility fired in a sewage sludge |
| | | incinerator: dry metric tons |
| | b. | Do you own or operate all sewage sludge incinerators in which sewage sludge from your facility is fired? |
| | | YesNo |
| | | If no, answer questions c - g for each sewage sludge incinerator that you do not own or operate. If you send |
| | | sewage sludge to more than one sewage sludge incinerator, attach additional pages as necessary. |
| | c. | Incinerator name or number: |
| | d. | Contact person: |
| | u. | Title: |
| | | |
| | | Phone: () |
| | _ | Contact is:Incinerator OwnerIncinerator Operator |
| | e. | Mailing address. |
| | | Street or P.O. Box: |
| | | City or Town: State: Zip: |
| | f. | Total dry metric tons per 365-day period of sewage sludge from your facility fired in this sewage sludge |
| | | incinerator: dry metric tons |
| | g. | List on this form or an attachment the numbers of all other federal, state or local permits that regulate the |
| | | firing of sewage sludge at this incinerator: |
| | | Permit Number: Type of Permit: |
| | | *************************************** |
| | | |
| | | |
| 10.NA | Dispos | sal in a Municipal Solid Waste Landfill. |
| | (Compl | lete Question 10 if sewage sludge from your facility is placed on a municipal solid waste landfill. Provide the following information |
| | for eacl | municipal solid waste landfill on which sewage studge from your facility is placed. If sewage studge is placed on more than one |
| | munici | oal solid waste landfill, attach additional pages as necessary.) |
| | a. | Landfill name: |
| | b. | Contact person: |
| | | Title: |
| | | Phone: () |
| | | Contact is:Landfill OwnerLandfill Operator |
| | c. | Mailing address. |
| | • | Street or P.O. Box: |
| | | City or Town: State: Zip: |
| | d. | Landfill location. |
| | u. | |
| | | Street or Route #: |
| | | County: |
| | | City or Town: State: Zip: |
| | e. | Total dry metric tons per 365-day period of sewage sludge placed in this municipal solid waste landfill: |
| | | dry metric tons |
| | f. | List, on this form or an attachment, the numbers of all federal, state or local permits that regulate the |
| | | operation of this municipal solid waste landfill: |
| | | Permit Number: Type of Permit: |
| | | ·· |
| | | |
| | g. | Does sewage sludge meet applicable requirements in the Virginia Solid Waste Management Regulation, 9 |
| | 5. | VAC 20-80-10 et seq., concerning the quality of materials disposed in a municipal solid waste landfill? |
| | | YesNo |
| | 1. | |
| | h. | Does the municipal solid waste landfill comply with all applicable criteria set forth in the Virginia Solid |
| | | Waste Management Regulation, 9 VAC 20-80-10 et seq.?YesNo |
| | i. | Will the vehicle bed or other container used to transport sewage sludge to the municipal solid waste landfill |
| | | be watertight and covered? Yes No |
| | | Show the haul route(s) on a location map or briefly describe the route below and indicate the days of the week |
| | | and time of the day sewage sludge will be transported. |

CLIENT:

Southampton County

ATTN:

Dennis E. Beale

ADDRESS: 17287 Pittman Road

Boykins, VA 23827

PHONE:

(757) 653-9269/653-8187cell

FAX:

dbeale@southamptoncounty.org (D

Special Notes:

Boykins WWP (Part D) Sludge Cake

SAMPLE COLLECTED BY: CLIENT

GRAB COLLECTION:

Date: 4/29/2014

Time: 1530

COMPOSITE COLLECTION:

Start Date:

Time:

End Date:

Time:

PICK UP BY: REED - JS

SAMPLE RECEIPT:

Date: 4/30/2014

Time: 1450

NUMBER OF CONTAINERS: 1

SAMPLE CONDITION: ✓ Good ☐ Other (See C-O-C)

REPORT NO: 14-06503 11:59

SAMPLE ID:

Boykins STP

SAMPLE NO: 14-06503

| | Method | JRA | | | | | |
|---------------------------------|--------|-------|--------|-------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Cyanide | 9012B | 0.58 | 2.03 | mg/Kg | LEF | 05/07/14 | 1416 |
| Total Phenol | 9066 | 2.90 | < 2.90 | mg/Kg | PEJ | 05/13/14 | 1636 |
| Total Antimony | 6010C | 2.82 | 30.8 | mg/Kg | EFA | 05/09/14 | 1138 |
| Total Arsenic | 6010C | 2.82 | 3.44 | mg/Kg | EFA | 05/09/14 | 1138 |
| Beryllium | 6010C | 0.282 | 3.30 | mg/Kg | EFA | 05/09/14 | 1138 |
| Totai Cadmium | 6010C | 0.282 | 3.17 | mg/Kg | EFA | 05/09/14 | 1138 |
| Total Chromium | 6010C | 0.565 | 39.2 | mg/Kg | EFA | 05/09/14 | 1138 |
| Total Copper | 6010C | 1.13 | 314 | mg/Kg | EFA | 05/09/14 | 1138 |
| Total Lead | 6010C | 2.82 | 50.9 | mg/Kg | EFA | 05/09/14 | 1138 |
| Total Nickel | 6010C | 2.82 | 13.7 | mg/Kg | EFA | 05/09/14 | 1138 |
| Mercury | 7471B | 0.058 | 0.126 | mg/kg | LEF | 05/09/14 | 1020 |
| Total Silver | 6010C | 0.565 | 5.25 | mg/Kg | EFA | 05/09/14 | 1138 |
| Total Selenium | 6010C | 2.82 | 3.80 | mg/Kg | EFA | 05/09/14 | 1138 |
| Total Thallium | 6010C | 2.82 | < 2.82 | mg/Kg | EFA | 05/09/14 | 1138 |
| Total Zinc | 6010C | 2.82 | 902 | mg/Kg | EFA | 05/09/14 | 1138 |
| Semi-Volatile Organic Compounds | | | | | | | |
| Acenaphthylene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Hexachlorocyclopentadiene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 2-Chloronaphthalene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Hexachlorobutadiene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Dimethyl phthalate | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 2,6-Dinitrotoluene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Acenaphthene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 4-Nitrophenol | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 1,2,4-Trichlorobenzene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Hexachlorethane | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 2,4-Dinitrophenol | 8270D | 23 | < 23 | mg/Kg | CLH | 05/13/14 | 1612 |
| 2,4-Dichlorophenol | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Bis(2-Chloroethoxy)methane | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 2,4-Dimethylphenol | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |

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770 Pilot House Drive, Newport News, VA 23606

(757) 873-4703 • Fax: (757) 873-1498

VELAP# 460013

EPA# VA00015



SAMPLE ID: Boykins STP SAMPLE NO: 14-06503

| | Method | JRA | | | | | |
|--------------------------------|--------|-------|--------|-------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Semi-Volatile Organic Compound | S | | | | | | |
| 2-Nitrophenol | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Isophorone | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 2,4-Dinitrotoluene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Nitrobenzene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 2,4,6-Trichlorophenol | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Bis(2-chloroisopropyl) ether | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Bis(2-chloroethyl) ether | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 2-Chlorophenol | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Phenol | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| N-Nitrosodimethylamine | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| N-Nitroso-di-n-propylamine | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Benzo[k]fluoranthene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 4-Chloro-3-methylphenol | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Diethyl phthalate | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Naphthalene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Benzo[g,h,i]perylene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Dibenz[a,h]anthracene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Indeno[1,2,3-c,d]pyrene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Benzo[b]fluoranthene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Di-n-Octyl phthalate | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Chrysene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Benzo[a]anthracene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Bis(2-ethylhexyl) phthalate | 8270D | 5.8 | 36 | mg/Kg | CLH | 05/13/14 | 1612 |
| 3,3-Dichlorobenzidine | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Butyl benzyl phthalate | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 4-Bromophenyl phenyl ether | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 4-Chlorophenyl phenyl ether | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Benzo[a]pyrene | 8270D | . 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Pyrene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 4,6-Dinitro-2-methylphenol | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| 1,2,-Diphenylhydrazine | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Fluorene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Hexachlorobenzene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Pentachlorophenol | 8270D | 12 | < 12 | mg/Kg | CLH | 05/13/14 | 1612 |
| Phenanthrene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Anthracene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| di-n-Butyl phthalate | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Fluoranthene | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Benzidine | 8270D | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Diphenlyamine & Nitrosodiphen | | 5.8 | < 5.8 | mg/Kg | CLH | 05/13/14 | 1612 |
| Volatile Organic Compounds | | | | | | | |
| Bromodichloromethane | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Carbon Tetrachloride | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| 1,1-Dichloroethane | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |

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SAMPLE ID: Boykins STP SAMPLE NO: 14-06503

| | Method | JRA | | | | | |
|------------------------------------|--------|------|--------|-------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Volatile Organic Compounds | | | | | | | |
| 1,1,1-Trichloroethane | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| 1,2-Dichloroethane | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Chloroform | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| trans-1,2-Dichloroethene | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| 1,1-Dichloroethene | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Methylene Chloride/Dichloromethane | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Chloroethane | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Vinyl Chloride | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Chloromethane (Methyl Chloride) | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| 1,1,2,2-Tetrachloroethane | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| 1,2-Dichlorobenzene | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Bromomethane | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Tetrachloroethene | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| 1,4-Dichlorobenzene | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| 1,3-Dichlorobenzene | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| 1,3-Dichloropropene(cis & trans) | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Acrolein | 8260B | 5.50 | < 5.50 | mg/kg | TAG | 05/08/14 | 2245 |
| Ethylbenzene | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Acrylonitrile | 8260B | 5.50 | < 5.50 | mg/kg | TAG | 05/08/14 | 2245 |
| Toluene | 8260B | 0.55 | 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| 1,2-Dichloropropane | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Bromoform | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| 2-Chloroethyl vinyl ether | 8260B | 1.10 | < 1.10 | mg/kg | TAG | 05/08/14 | 2245 |
| Benzene | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| 1,1,2-Trichloroethane | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Dibromochloromethane | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Trichloroethene | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |
| Chlorobenzene/Monochlorobenzene | 8260B | 0.55 | < 0.55 | mg/kg | TAG | 05/08/14 | 2245 |

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(757) 873-4703 • Fax: (757) 873-1498



SAMPLE ID: Boykins STP 14-06503 SAMPLE NO:

JRA Method Unit Date Time QLResult Analyst Number Parameter

NOTES:

JRA Quantification Level is the concentration of the lowest calibration standard above zero with a reliable signal.

Reproduction of this report is not permitted, except in full, without written approval from James R Reed & Associates.

The results on this report relate only to the sample(s) provided for analysis.

Results conform to NELAC standards, where applicable, unless otherwise indicated.

Reported results on dry weight basis.

Authorized By: Claime Claude

Elaine Claiborne, Laboratory Director

15-May-14 Date:





CHAIN OF CUSTODY

| | | | | | | | | | | | ≥ | ANALYSES REQUESTED | SES | RE | QUE | EST | Ü | | | | |
|--|-----------------|-------------------------|-------------------|----------|----------------------------|---------------------------|-----------|------|----------|--------------------------------|---------------------------------|--------------------------|-----|----|-------|-------|-------------|------------------------|---------------|-------------|----------|
| | | | | | | | Bottle ID | | | A | | | | | | | | \dashv | \dashv | \dashv | - |
| Company Name: Southampton County Public Utilities | nty Public Ut | ilities | | | | | Preserv. | | | _ | | | | | | | | | | | |
| Company Contact: Dennis Beale | | Telephone: 757-653-9269 | 757-653 | -9269 | · | | | | | | | | | | | | | | | | |
| Results To: Dennis Beale | | Fax | Fax: 757-654-6025 | -6025 | ı | | | | | | , | ** | | | | | *********** | | | | |
| Address: 17287 Pittman Road, Boykins, VA 23827 | ad, Boykins, | VA 23827 | | | | | | rec | | | 20 | 27 (625) | | | | | | | | | |
| | | | | | | | | SS | | | | 4s (₹ | | | | | - | | | | |
| Project ID: Boykins WWP (Part D) - Sludge Cake | (Part D) - | Sludge | Cake | | | | | rdne | | | ** | BNA | | | | | | | | | |
| | | | | | | | • | Нa | | | | iles | | | | | | | | | |
| | | Composite | site | | Grab | | | *, & | | lics | es (| olat | | | | | | | | | |
| JRA Sample Sample Location | Start | Start | End | End | Date | Time | Total # | tals | anic | eno | | miv | | | | | | | | | |
| ID#//Type* | Date | Time | Date | Time | | | of cont. | Me | | Ph | | Se | | | | | | | \vdash | \vdash | - |
| 06503 WW Byth | 425-17 | | H-324 | | 4-25-14 | 15-70 | | × | | × | | × | | | | | | | T | T | + |
| | - | | | | | | | | | | | | | | | | | T | | - | - |
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| | | | | | | | | | | | | | | | | | | | | | |
| | | | | | | | | | | | | | | | | | | | - | | <u> </u> |
| *WW= Wastewater, GW = Groundwater, DW - Drinking Water, HW - Hazardous Waste, OTHERS | Drinking Water, | HW - Hazar | dous Waste | , OTHERS | | | | | | t. | | | | | | | | | | | |
| | | . t | | | | | | | Prese | Preservatives: | /es: | | | | | | | | | | |
| Sampled By: / / Gric / Journal | ميلأ | | _Date/Time | : 4-28-1 | Date/Time: 4-28-14 / 15 Yu | 40 | • | | 1 = <6°C | 6°C | $6 = Na_2S_2O_3 + HCI$ | о́ + Н | Ω | | 10=A | scorb | ic Ac | 10=Ascorbic Acid + HCI | Ω | | |
| Relinquished By: Dehm's Bearly | 1 Domm Buli | Bull | _ Date/Time | : 4-30 | -2014 | 1120 | | | 2=+ | NO3 | $2 = HNO_3$ $7 = NaOH + ZnOAc$ | + ZnC | Àc | | 11=HQ | Ω | | | | | |
| Received By: Think of S | , | | _ Date/Time | 420 | -2014 | Date/Time: 4-30-7014 1120 | , ~ | | 3 1 | 1 ₂ SO ₄ | $3 = H_2SO_4 8 = H_2SO_4 + FAS$ | 4+ FAS | 0, | | 12=Z | inc A | cetate | 12=Zinc Acetate + NaOH | HOE | | |

*Metals: Sb, As, Bé, Cd, Cr, Cu, Pb, Ni, Hg, Ag, Se, Tl, Zn
**Part D

Relinquished By: Received By:

Date/Time: 4.20_14

 $4 = NaOH 9 = NH_4CI$

 $5 = Na_2S_2O_3$

13=Na₂SO₃ + HCl 14=Na₂SO₃ + H₂SO₄

_for Compliance __Not for Compliance

Arrival Temp: ______°C

JAMES R. REED and ASSOCIATES (757) 873-4703; FAX (757) 873-1498 770 Pilot House Drive, Newport News, VA 23606

CLIENT:

Southampton County

ATTN:

Dennis E. Beale

ADDRESS: 24283 Old Bridge Road

Courtland, VA 23837

PHONE:

(757) 653-9269/653-8187cell

FAX:

e: dbeale@southamptoncounty.org

Special Notes: RE: BOYKINS WWP (PART D) - SLUDGE CAKE

SAMPLE COLLECTED BY: CLIENT

GRAB COLLECTION:

Date: 9/23/2014

Time: 1540

COMPOSITE COLLECTION:

Start Date:

Time:

End Date:

Time:

PICK UP BY: REED - JS

SAMPLE RECEIPT:

Date: 9/24/2014

Time: 1459

NUMBER OF CONTAINERS: 1

SAMPLE CONDITION: ✓ Good ☐ Other (See C-O-C)

REPORT NO: 14-14521 10:26

SAMPLE ID:

BOYKINS SLUDGE CAKE

SAMPLE NO: 14-14521

| | Method | JRA | | | | | |
|---------------------------------|--------|-------|---------|-------|---------|----------|------|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Total Antimony | 6010C | 1.54 | 21.1 | mg/Kg | EFA | 09/29/14 | 1128 |
| Total Arsenic | 6010C | 1.54 | < 1.54 | mg/Kg | EFA | 09/29/14 | 1128 |
| Beryllium | 6010C | 0.154 | 2.85 | mg/Kg | EFA | 09/29/14 | 1128 |
| Total Cadmium | 6010C | 0.154 | 3.13 | mg/Kg | EFA | 09/29/14 | 1128 |
| Total Chromium | 6010C | 0.308 | 30.7 | mg/Kg | EFA | 09/29/14 | 1128 |
| Total Copper | 6010C | 0.616 | 241 | mg/Kg | EFA | 09/29/14 | 1128 |
| Total Lead | 6010C | 1.54 | 37.1 | mg/Kg | EFA | 09/29/14 | 1128 |
| Total Nickel | 6010C | 1.54 | 14.8 | mg/Kg | EFA | 09/29/14 | 1128 |
| Mercury | 7471B | 0.029 | 0.032 | mg/kg | PEJ | 09/26/14 | 1712 |
| Total Silver | 6010C | 0.308 | 3.26 | mg/Kg | EFA | 09/29/14 | 1128 |
| Total Selenium | 6010C | 1.54 | 2.80 | mg/Kg | EFA | 09/29/14 | 1128 |
| Total Thallium | 6010C | 1.54 | < 1.54 | mg/Kg | EFA | 09/29/14 | 1128 |
| Total Zinc | 6010C | 1.54 | 803 | mg/Kg | EFA | 09/29/14 | 1128 |
| Cyanide | 9012B | 0.311 | < 0.311 | mg/Kg | ARC | 09/26/14 | 1349 |
| Total Phenol | 9066 | 3.08 | < 3.08 | mg/Kg | PEJ | 10/06/14 | 1452 |
| Semi-Volatile Organic Compounds | | | | | | | |
| 2-Nitrophenol | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 2,4,6-Trichlorophenol | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Hexachlorocyclopentadiene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 4-Chloro-3-methylphenol | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Hexachlorobutadiene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 1,2,4-Trichlorobenzene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 2,4-Dichlorophenol | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Bis(2-Chloroethoxy)methane | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 2,4-Dimethylphenol | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Isophorone | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| N-Nitroso-di-n-propylamine | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Nitrobenzene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Hexachlorethane | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Naphthalene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |

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REPORTION ANALYSIS

SAMPLE ID: BOYKINS SLUDGE CAKE

SAMPLE NO: 14-14521

| | Method | JRA | | | | | |
|---------------------------------|--------|-----|--------|---|---------|---------------------------------------|--------|
| Parameter | Number | QL. | Result | Unit | Analyst | Date | Time |
| Semi-Volatile Organic Compounds | | | | *************************************** | | · · · · · · · · · · · · · · · · · · · | |
| 2-Chloronaphthalene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Phenol - | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Bis(2-chloroisopropyl) ether | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| N-Nitrosodimethylamine | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Bis(2-chloroethyl) ether | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Bis(2-ethylhexyl) phthalate | 8270D | 1.6 | 7.0 | mg/Kg | CLH | 09/27/14 | 0252 |
| Fluoranthene , | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Dibenz[a,h]anthracene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Benzo[a]pyrene | 8270D | 1.6 | 4.3 | mg/Kg | CLH | 09/27/14 | 0252 |
| Benzo[b]fluoranthene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Benzo[k]fluoranthene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Di-n-Octyl phthalate | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| di-n-Butyl phthalate | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Benzo[a]anthracene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Benzo[g,h,i]perylene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 3,3-Dichlorobenzidine | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Butyl benzyl phthalate | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Acenaphthylene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Pyrene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 2-Chlorophenol | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Benzidine | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Chrysene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Diethyl phthalate | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Dimethyl phthalate | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 2,6-Dinitrotoluene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Acenaphthene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 2,4-Dinitrophenol | 8270D | 6.2 | < 6.2 | mg/Kg | CLH | 09/27/14 | 0252 |
| Indeno[1,2,3-c,d]pyrene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 2,4-Dinitrotoluene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Anthracene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 4-Chlorophenyl phenyl ether | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Fluorene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Pentachlorophenol | 8270D | 3.1 | < 3.1 | mg/Kg | CLH | 09/27/14 | 0252 |
| 4-Nitrophenol | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Phenanthrene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 4,6-Dinitro-2-methylphenol | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Hexachlorobenzene | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 4-Bromophenyl phenyl ether | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| 1,2,-Diphenylhydrazine | 8270D | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Diphenlyamine & Nitrosodiphenyl | | 1.6 | < 1.6 | mg/Kg | CLH | 09/27/14 | 0252 |
| Volatile Organic Compounds | | 1.0 | - 1,0 | mg Mg | | -2.001144 | عد بدن |
| 1,1-Dichloroethane | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Benzene | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Bromomethane | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |

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770 Pilot House Drive, Newport News, VA 23606

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SAMPLE ID: BOYKINS SLUDGE CAKE

SAMPLE NO: 14-14521

| D | Method | JRA | | | | | |
|-----------------------------------|---------|-----|--------|-------|---------|----------|---|
| Parameter | Number | QL | Result | Unit | Analyst | Date | Time |
| Volatile Organic Compounds | | | | | | | *************************************** |
| Vinyl Chloride | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Chloroethane | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Methylene Chloride/Dichloromethan | e 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| 1,1-Dichloroethene | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Chloromethane (Methyl Chloride) | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| 2-Chloroethyl vinyl ether | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| 1,4-Dichlorobenzene | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| 1,3-Dichlorobenzene | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| 1,2-Dichlorobenzene | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| 1,3-Dichloropropene(cis & trans) | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Acrylonitrile | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Acrolein | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Ethylbenzene | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Chlorobenzene/Monochlorobenzene | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Toluene | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Dibromochloromethane | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Bromoform | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| trans-1,2-Dichloroethene | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| 1,1,2-Trichloroethane | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Trichloroethene | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| 1,2-Dichloropropane | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| 1,1,2,2-Tetrachloroethane | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Bromodichloromethane | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Carbon Tetrachloride | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| 1,1,1-Trichloroethane | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| 1,2-Dichloroethane | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Chloroform | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |
| Tetrachloroethene | 8260B | 0.3 | < 0.3 | mg/kg | SDT | 10/02/14 | 1755 |

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SAMPLE ID: BOYKINS SLUDGE CAKE

SAMPLE NO: 14-14521

Method JRA
Parameter Number QL Result Unit Analyst Date Time

NOTES:

JRA Quantification Level is the concentration of the lowest calibration standard above zero with a reliable signal.

Reproduction of this report is not permitted, except in full, without written approval from James R Reed & Associates.

The results on this report relate only to the sample(s) provided for analysis.

Results conform to NELAC standards, where applicable, unless otherwise indicated.

Results in mg/kg are reported on a dry weight basis.

Authorized By: Llaire

Elaine Claiborne, Laboratory Director

Date: 10-Oct-14





CHAIN OF CUSTODY

| | | | | | | | | | | l | 2 | A | ANALY SES REQUESTED | 000 | אור כ | CEC | | | - | | 1 | ı |
|--|--|-------------|-----------|---------------------------|--------------------|-----------|-------|------------------|-------|----------------------|---------------|--|---------------------|-----|-------|-----------------|---|--------------------|---------|---|---|-----|
| | | | | | | | | Bottle ID | | | Æ. | 7 | | | | - | - | \vdash | _ | _ | - | 1 |
|) | O Posithomation County Dublic Litilities | | Ď | | | | | Preserv. | | | | | 4 | | | _ | _ | _ | - | - | - | 1 |
| Company Contact: Dennis Beale | Dennis Beale | Tele | phone: | Telephone: 757-653-9269 | 9269 | | | | | | | 14 | 25 | | | | | | | | | |
| Results To: | Results To: Dennis Beale | | Fax: | Fax: 757-654-6025 | 6025 | • | | | | | | (25 2.F | 5)** - 1 | | | | , | | | | | |
| Address: | Address: 17287 Pittman Road, Boykins, VA 23827 | oykins, VA | 23827 | | | ' | | | | | | TAG FI | s (62) | | | | | | | | | |
| Project ID: | Project ID: Boykins WWP (Part D) - Sludge Cake | ırt D) - SI | udge (| Sake | | | | | | | ~ · · · · · | 21.50 24)** | s BNA | | | | ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,, | | | | | |
| | | | Composite | fe | | Grab | ס | | * | de | | es (6 | olatil | | | | ·········· | | | | | |
| Sample | Sample Location | Start | Start | End | End Time | Date | Time | Total # of cont. | Metal | Cyani | Pheno | Volati | Semi | | | | | | ļ | | | 1 |
| = 1750 - | | | | - | | 7-23-17 | 15-40 | | × | × | × | 1 | × | _ | _ | - | \downarrow | 4 | - | _ | - | 1 |
| 1700 | Judge Cake | | | | | | | | | | | | | _ | _ | - | _ | _ | _ | _ | + | - 1 |
| Ý | | | | | | | | | | _ | _ | | _ | _ | 4 | | _ | \downarrow | _ | - | _ | |
| | | | | | | | | | | | _ | | | _ | _ | _ | 4 | _ | 4 | _ | 4 | 1 |
| | | | | | | | | | | | _ | | | | _ | _ | | | | | | 1 |
| | | | | | | | | | | | | | | | | | | | | | _ | 1 |
| | | | | | | | | | | | | | | | _ | - | _ | _ | _ | _ | _ | 1 |
| | | | | | | | | | | | _ | | | | _ | _ | _ | _ | _ | _ | - | |
| | | la Water HW | Logora | Olie Waste | OTHERS | , | | | | | | | | | | | | | | | | - 1 |
| Sampled By: | Sampled By: Online State of the Control of the Con | | | Date/Time | Date/Time: 5-23-14 | 7 | 1555 | | | Preservatives: | rvativ 5°C | Preservatives: $1 = <6^{\circ}C$ $6 = Na_2S_2O_3 + HCI$ | 203 + H | Ω | | 10=As | 10=Ascorbic Acid + HCI | : Acid | + HO | _ | | |
| Relinquished By: Received By: | 1 3 | Emma Be | iente | Date/Time: Date/Time: | 1 1 | 4-14 | 5211 | NA | | 3 2 # # | So. So. | $2 = HNO_3$ $7 = NaOH + ZnO_4$ $3 = H_2SO_4 + FAS$ | 1 + Zn(), + FA | S | | 17=H(12=Zii | 11=HCI 12=Zinc Acetate + NaOH | etate : | + NaC | ĭ | | |
| Relinquished By: Received By: | Temes | | | Date/Time: _Date/Time: | 1 1 | 0-24-14 c | 65011 | 1 1 | | 01 4 11 11 2 2 | = NaOH 9 | $4 = NaOH 9 = NH_4O$ $5 = Na_2S_2O_3$ | <u>.</u> | | | 14=N | 14=Na ₂ SO ₃ + H ₂ SO ₄ | + H ₂ (| 0,0 | | | |
| for Compliance | | | | | | | | | | | | | | | | | | | | | | |
| The state of the s | | | | | | | | | | | | | | | | | | | | | | |

JAMES R. REED and ASSOCIATES (757) 873-4703; FAX (757) 873-1498 770 Pilot House Drive, Newport News, VA 23606

Arrival Temp:

3.2

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Not for Compliance

* Metals: Sb, As, Be, Cd, Cr, Cu, Pb, Ni, Hg, Ag, Se, Tl, Zn **Part D

CLIENT:

South impton County

ATTN:

Dennis E. Beale

ADDRESS: 24283 Old Bridge Road

Court and, VA 23837

PHONE:

(757) 653-9269/653-8187cell

FAX:

e: dbehle@southamptoncounty.org

Special Notes:

Boykins WWP (Part D) - Sludge Cake

SAMPLE COLLECTED BY: CLIENT

GRAB COLLECTION:

Date: 11/9/2014

Time: 1530

COMPOSITE COLLECTION:

Start Date:

Time:

End Date:

Time:

PICK UP BY: REED - DB

SAMPLE RECEIPT:

Date: 11/10/2014

Time: 1410

NUMBER OF CONTAINERS: I

SAMPLE CONDITION: ☑ Good ☐ Other (See C-O-C)

REPORT NO: 14-17168 11:22

SAMPLE ID: SAMPLE NO: BOYKIN

14-17168

| Parameter | | Method Number | JRA QL | Result | Unit | Analyst | Date | Time |
|----------------------|--------------|------------------|-----------|---------|--------|---------|----------|------|
| Total Antimony | | 6010C | 2.15 | 23.8 | mg/Kg | EFA | 11/18/14 | 1554 |
| Total Arsenic | | 6010C | 2.15 | < 2.15 | mg/Kg | EFA | 11/18/14 | 1554 |
| Beryllium | | 6010C | 0.215 | 3.28 | mg/Kg | EFA | 11/18/14 | 1554 |
| Total Cadmium | | 6010C | 0.215 | 3.90 | mg/Kg | EFA | 11/18/14 | 1554 |
| Total Chromium | | 6010C | 0.430 | 33.9 | mg/Kg | EFA | 11/18/14 | 1554 |
| Total Copper | | 6010C | 0.860 | 284 | mg/Kg | EFA | 11/18/14 | 1554 |
| Total Lead | | 6010C | 2.15 | 43.0 | mg/Kg | EFA | 11/18/14 | 1554 |
| Total Nickel | | 6010C | 2.15 | 14.4 | mg/Kg | EFA | 11/18/14 | 1554 |
| Mercury | | 7471B | 0.046 | 0.296 | mg/kg | PEJ | 11/18/14 | 1456 |
| Total Silver | | 6010C | 0.430 | 3.95 | mg/Kg | EFA | 11/18/14 | 1554 |
| Total Selenium | | 6010C | 2.15 | 3.67 | mg/Kg | EFA | 11/18/14 | 1554 |
| Total Thallium | | 6010C | 2.15 | < 2.15 | mg/Kg | EFA | 11/18/14 | 1554 |
| Total Zinc | | 6010C | 2.15 | 918 | mg/Kg | EFA | 11/18/14 | 1554 |
| Cyanide | ; | 9012B | 0.485 | < 0.485 | mg/Kg | ARC | 12/03/14 | 1439 |
| Total Phenol | • | 9066 | 4.56 | 8.13 | ing/Kg | PEJ | 11/21/14 | 1045 |
| Semi-Volatile Organi | ic Compounds | | | | | | | |
| 2-Nitrophenol | _ | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 2,4,6-Trichloropher | nol | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Hexachlorocyclope | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 4-Chloro-3-methy | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Hexachlorobutadien | | 8270D | 2.5 | < 2.5 | mg/Kg | . CLH | 11/26/14 | 1900 |
| 1,2,4-Trichlorobenz | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 2,4-Dichlorophenol | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Bis(2-Chloroethox) | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 2,4-Dimethylphen | • | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| lsophorone | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| N-Nitroso-di-n-proj | pylamine | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Nitrobenzene | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Hexachlorethane | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Naphthalene | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |

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VELAP# 460013

EPA# VA00015



SAMPLE ID: BOYKIN SAMPLE NO: 14 17168

| **** | | | | | | | | |
|---------------------|-----------------|--|-----------|--------|-------|---------|--|------|
| Parameter | | Method Number | JRA QL | Result | Unit | Analyst | Date | Time |
| Semi-Volatile Orga | nic Compounds | | | | | | ······································ | |
| 2-Chloronaphthal | - | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Phenol | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Bis(2-chloroisopr | nvl) ether | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| N-Nitrosodimethy | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Bis(2-chloroethyl | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Bis(2-ethylhexyl) | | 8270D | 2.5 | 5.1 | mg/Kg | CLH | 11/26/14 | 1900 |
| Fluoranthene | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Dibenz[a,h]anthra | cene | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Benzo[a]pyrene | | 8270D | 2.5 | 6.1 | mg/Kg | CLH | 11/26/14 | 1900 |
| Benzo[b]fluorantl | ene | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Benzo[k]fluorantl | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Di-n-Octyl phthal | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| di-n-Butyl phthala | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Benzo[a]anthrace | | 8270D | 2.5 | 4.9 | mg/Kg | CLH | 11/26/14 | 1900 |
| Benzo[g,h,i]peryle | ne | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 3,3-Dichlorobenz | dine | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Butyl benzyl plith | late | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Acenaphthylene | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Pyrene | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 2-Chlorophenol | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Benzidine | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Chrysene | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Diethyl phthalate | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Dimethyl phthalat | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 2,6-Dinitrotoluend | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Acenaphthene | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 2,4-Dinitrophenol | | 8270D | 10 | < 10 | mg/Kg | CLH | 11/26/14 | 1900 |
| Indeno[1,2,3-c,d] | yrene | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 2,4-Dinitrotoluend | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Anthracene | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 4-Chlorophenyl pl | enyl ether | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Fluorene | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Pentachloropheno | | 8270D | 5.0 | < 5.0 | mg/Kg | CLH | 11/26/14 | 1900 |
| 4-Nitrophenol | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Phenanthrene | | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 4,6-Dinitro-2-metl | ylphenol | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Hexachlorobenzer | e | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 4-Bromophenyl pl | enyl ether | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| 1,2,-Diphenylhydr | 1 - | 8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Diphenlyamine & | Nitrosodiphenyl | ami8270D | 2.5 | < 2.5 | mg/Kg | CLH | 11/26/14 | 1900 |
| Volatile Organic Co | , - | The state of the s | | | | | | |
| 1,1-Dichloroethan | Į. | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Benzene | | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Bromomethane | | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| | | ļ | | | | | | |

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SAMPLE ID: BOYKIN SAMPLE NO: 14-17168

ALEMAN ...

| | | Method | JRA | | | | | |
|--------------------|------------------|-----------|-----|--------|-------|---------|----------|------|
| Parameter | | Number | QL | Result | Unit | Analyst | Date | Time |
| Volatile Organic C | ompounds | | | | | | | |
| Vinyl Chloride | | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Chloroethane | | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Methylene Chlori | de/Dichlorometl | ane 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| 1,1-Dichloroether | le | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Chloromethane (1 | Methyl Chloride) | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| 2-Chloroethyl vin | yl ether | 8260B | 1.0 | < 1.0 | mg/kg | SDT | 11/16/14 | 1905 |
| 1,4-Dichlorobenz | ene | . 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| 1,3-Dichlorobenz | ene | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| 1,2-Dichlorobenz | ene | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| 1,3-Dichloroprop | ene(cis & trans) | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Acrylonitrile | | 8260B | 5.0 | < 5.0 | mg/kg | SDT | 11/16/14 | 1905 |
| Acrolein | | 8260B | 5.0 | < 5.0 | mg/kg | SDT | 11/16/14 | 1905 |
| Ethylbenzene | | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Chlorobenzene/M | onochlorobenze | ne 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Toluene | | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Dibromochlorom | thane | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Bromoform | | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| trans-1,2-Dichlor | ethene | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| 1,1,2-Trichloroet | ane | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Trichloroethene | | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| 1,2-Dichloroprop | ine | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| 1,1,2,2-Tetrachlo | oethane | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Bromodichlorom | thane | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Carbon Tetrachlo | ide | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| 1,1,1-Trichloroetl | ane | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| 1,2-Dichloroethar | е | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Chloroform | | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |
| Tetrachloroethend | | 8260B | 0.5 | < 0.5 | mg/kg | SDT | 11/16/14 | 1905 |

James R Reed & Associates

770 Pilot House Drive, Newport News, VA 23606

(757) 873-47 3 • Fax: (757) 873-1498



SAMPLE ID: BOYKIN SAMPLE NO: 14-17168

> Method Number

JRA

QL

Result

Unit Analyst

Date

Time

NOTES:

Parameter

JRA Quantification Level is the concentration of the lowest calibration standard above zero with a reliable signal.

Reproduction of this report is not permitted, except in full, without written approval from James R Reed & Associates.

The results on this report relate only to the sample(s) provided for analysis.

Results conform to NELA standards, where applicable, unless otherwise indicated.

Results reported on dry weight basis.

Authorized By: Lloca Clasica

Elaine Claiborne, Laboratory Director

Date: 04-Dec-14

James R. Reed & Associates 770 Pilot House Prive, Newport News, VA 23606

(757) 873-4703 • Fax: (757) 873-1498





CHAIN OF CUSTODY

ANALYSES REQUESTED

| | | | | | Bot | Bottle ID | | | A | | | | | | | | |
|--|-------------------|-------------------------|--------------------------|---------|--|-----------|------|---------------------|--|----------|------|-------|---|----------|---------|-------------|---|
| Company Name: Southampton County Public Utilities | Public Utilities | | | | Preserv | ëν. | | | | | | | | | | | |
| Company Contact: Dennis Beale | Teleph | Telephone: 757-653-9269 | .9269 | | 1 | | | | | | | | | | | | |
| Results To: Dennis Beale | | Fax: 757-654-6025 | 6025 | | | ···· | | | |)** | | | | | | | |
| Address: 17287 Pittman Road, Boykins, VA 23827 | Boykins, VA 23 | 827 | | | | | | | | (625 | | | | | | | |
| | | | | | | | | | | IAs (| | | | | | | |
| Project ID: Boykins WWP (Part D) - Sludge Cake | art D) - Slud | ge Cake | | | | | | | 24)** | s BN | | | | | | | 4 |
| | Cor | Composite | | Grab | | | | | es (6 | olatile | | | | | | | |
| JRA Sample Sample Location | Start Start | End | End | | Time Tot | Total # | anid | enol | | mivo | | | | | | | |
| 14 Type* | | Date | Time | | | of cont. | _ | | | Sei | | | | <u> </u> | | | |
| 200 | | | | 1-1-1-1 | کی اح | _ | | | | × | | | | | _ | | |
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| | | | | | | | - | \dashv | | | | | | | | | T |
| | | | | | | | | | | | | | | | | L | |
| *WW= Wastewater, GW = Groundwater, DW - Drinking Water, HW - Hazardous Waste, OTHERS | ing Water, HW - H | azardous Waste, | OTHERS | | | | | | | | | | | | | | |
| 7 | | | | _ | | | P | Preservatives: | tives: | | | | | | | | |
| Sampled By: \\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\ | | Date/Time | Date/Time: 11-9-1-1/1535 | 1535 | market de Australia de Australia de La marcia. | | | : <6°C | $1 = <6^{\circ}C$ $6 = Na_2S_2O_3 + HCI$ | 2S2O3++ | ₫ | 10=A | 10=Ascorbic Acid + HCl | c Acid | H) | 7 | |
| -Relinquished-By: | | ` | Date/Filme: 1) (C) | 7 | 4.33 | | 7 | TAC | 2-=-HNO ₃ 7-=-NaOH-+-ZnOAe | 9H-+-Zn(| ∋Ae— | 14-HQ | 2 | | | | |
| Osma | O O | | Date/Time: /1-10-/460 | (C) // | 5 | | ω | = H ₂ S(| $3 = H_2SO_4 8 = H_2SO_4 + FAS$ | 50, + FA | S | 12=Zi | 12=Zinc Acetate + NaOH | etate | + NaC | H | |
| Relinquished By: (1) A. S. S. S. S. A. A. | | Date/Time: | 11-10-1 | 161 141 | 0 | | 4. | * NaO | 4 = NaOH 9 = NH,C | Ω | | 13=N | 13=Na ₂ SO ₃ + HCl |) + HC | | | |
| Received By: | | Date/Time: / | 14-115-14 | 14 0 14 | 6 | | Ç) | $5 = Na_2S_2O_3$ | 5 ₂ O ₃ | | | 14=N | 14=Na ₂ SO ₃ + H ₂ SO ₄ |) + H25 | , SO | | |
| The transfer of the transfer o | | | | | | | | | | | | | | | | | |
| for Compliance | | | | | | | | | | | | | | | | | |
| Not for Compliance | | | | | | | | | | | | | | | | | |

JAMES R. REED and ASSOCIATES (757) 873-4703; FAX (757) 873-1498

Arrival Temp:

ング

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*Metals: Sb, As, Be, Cd, Cr, Cu, Pb, Ni, Hg, Ag, Se, Tl, Zn **Part D

Attachment 1

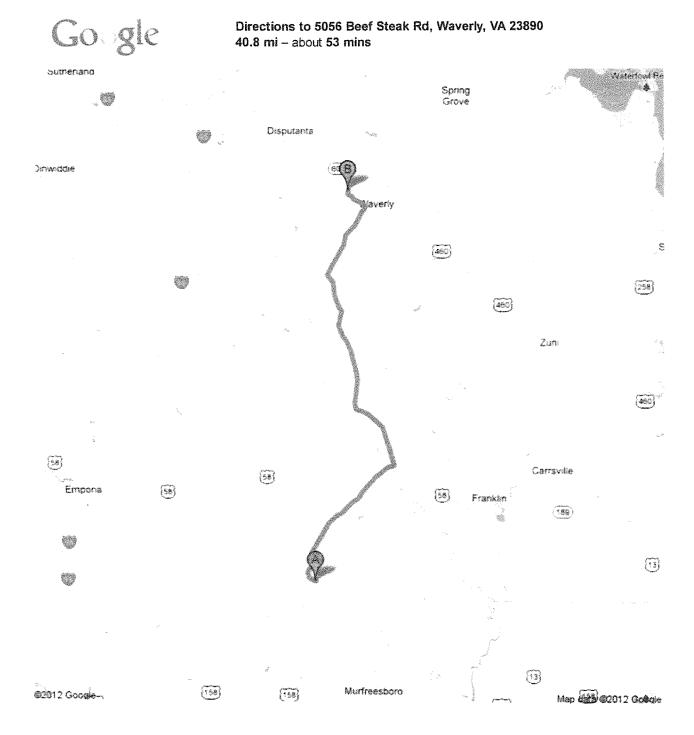
McGill Environmental Systems 5056 Beef Steak Road Waverly, VA 23890

Permit Number: VDHBUR 154

Company contact: Bob Broom

Business Development 757-647-6052

www.mcgillcompost.com





19028 Number 8 Schoolhouse Rd, Boykins, VA 23827

| 1. | Head west on Deloatche Ave/Number 8 Schoolhouse Rd/State Route 670 toward Brookside Dr Continue to follow Deloatche Ave/State Route 670 About 2 mins | go 0.7 mi total 0.7 mi |
|--------------|--|-----------------------------|
| 35 2. | Turn right onto VA-35 N/S Main St Continue to follow VA-35 N About 16 mins | go 12.9 mi total 13.6 mi |
| 35 3. | Turn left onto VA-35 N/Main St Continue to follow VA-35 N About 21 mins | go 18.3 mi total 31.8 mi |
| 40 4. | Turn right onto VA-40 E/Sussex Dr Continue to follow VA-40 E About 8 mins | go 6.7 mi total 38.5 mi |
| 5 . | Turn left onto Lobbs Shop Rd/State Route 651 About 5 mins | go 1.9 mi total 40.4 mi |
| 6. | Turn right onto Beef Steak Rd/State Route 626 Destination will be on the left About 1 min | go 0.4 mi total 40.8 mi |

These directions are for planning numbers only. You may find that construction projects, traffic and

5056 Beef Steak Rd, Waverly, VA 23890

These directions are for planning purposes only. You may find that construction projects, traffic, weather, or other events may cause conditions to differ from the map results, and you should plan your route accordingly. You must obey all signs or notices regarding your route.

Map data @2012 Google

Directions weren't right? Please find your route on maps google.com and click "Report a problem" at the bottom left.

VPDES Permit Application Addendum

| W | Entity to whom the permit is to be issued: Southampton County, VA. | |
|----------|---|--|
| | | |
| ۷. | Is this facility located within city or town boundaries? Yes No x | |
| 3. | Provide the tax map parcel number for the land where the discharge is located112/9A | |
| 4. | For the facility to be covered by this permit, how many acres will be disturbed during the next | |
| fir | ve years due to new construction activities? None | |
| 5 | What is the design average effluent flow of this facility? 0.59 MGD | |
| | For industrial facilities, provide the max. 30-day average production level, include units: | |
| | N/A | |
| | In addition to the design flow or production level, should the permit be written with limits for any other discharge flow tiers or production levels? Yes No x If "Yes", please identify the other flow tiers (in MGD) or production levels: | |
| Pl ex | ease consider the following questions for both the flow tiers and the production levels (if applicable): Do you plan to pand operations during the next five years? Is your facility's design flow considerably greater than your current flow? | |
| 6. | Nature of operations generating wastewater: | |
| I | Oomestic residential, Commercial, Industrial | |
| | 60 % of flow from domestic connections/sources | |
| | Number of private residences to be served by the treatment works: 582 | |
| | | |
| | 40 % of flow from non-domestic connections/sources | |
| 7. | Mode of discharge: x Continuous Intermittent Seasonal Describe frequency and duration of intermittent or seasonal discharges: | |
| 8. | Identify the characteristics of the receiving stream at the point just above the facility's discharge point: | |
| | X Permanent stream, never dry | |
| | Intermittent stream, usually flowing, sometimes dry | |
| | Ephemeral stream, wet-weather flow, often dry | |
| | Effluent-dependent stream, usually or always dry without effluent flow | |
| | Lake or pond at or below the discharge point | |
| | Other: | |
| 9. | Approval Date(s): | |
| | | |

<u>Please submit this completed form with your application Maintenance fee billing will be sent using this information</u>

Permit Maintenance Fee Information

(1) Facility Name Boykins Wastewater Treatment Plant

- (2) Permit Number: VA0026417
- (3) Tax Payer ID [FIN]: 54-6001618
- (4) Billing Information:

Corporate Name or Owner Name: Southampton County

Corporate Billing Address or Owner Address:

P.O. Box 400

Courtland, VA. 23837

(5)Billing Contact:

Name, Title:Michael W. Johnson, County Administrator / Southampton County

Phone Number:

(757) 653-3015

E-mail Address:

mjohnson@southamptoncounty.org

AUTHORIZATION TO BILL APPLICANT FOR A PUBLIC NOTICE

FOR BOYKINS WWTP, BOYKINS, VA RE: PERMIT NO. VA0026417

I hereby authorize the Department of Environmental Quality to have the cost of publishing a public notice billed to the Agent/Department shown below. The public notice will be published once a week for two consecutive weeks in the: **TIDEWATER NEWS**

Agent/Department to be billed:

Mr. Michael W. Johnson, County Administrator

Town of Boykins

Applicant's Address:

P. O. Box 400

Courtland, VA 23837

Agent's Telephone No:

757-653-3015

I AM ALSO AUTHORIZING THE TIDEWATER NEWS TO SEND THE AFFIDAVIT TO:

DEQ TIDEWATER REGIONAL OFFICE WATER PERMITS ATTN: ROBERT SMITHSON 5636 SOUTHERN BOULEVARD VIRGINIA BEACH, VA 23462

| Authorizing Agent/Date Signed: | MICHAEL W. JOHNSON | |
|-------------------------------------|--------------------------------|--|
| Authorizing Agent's | Print Name/Date/Signed | |
| Signature | Signature | |
| Authorizing Agent's E-Mail Address: | mjchusen@southamptencounty.org | |

RETURN COMPLETED FORM TO:

DEQ – Tidewater Regional Office Attn: Robert Smithson-Water Permits

Attn: Robert Smithson-Water P

5636 Southern Boulevard Virginia Beach, VA 23462

Cc: (DEQ FILE ECM)



COMMONWEALTH of VIRGINIA

DEPARTMENT OF ENVIRONMENTAL QUALITY
TIDEWATER REGIONAL OFFICE

5636 Southern Boulevard, Virginia Beach, Virginia 23462 (757) 518-2000 Fax (757) 518-2009 www.deq.virginia.gov

David K. Paylor Director

Maria R. Nold Regional Director

December 1, 2014

Mr. Michael W. Johnson, County Administrator Boykins WWTP P. O. Box 400 Courtland, VA 23837

Re:

Application for Re-issuance of VPDES Permit No. VA0026417

Town of Boykins WWTP, Boykins, VA

Dear Mr. Johnson:

Molly Joseph Ward

Secretary of Natural Resources

This letter is to remind you that the referenced VPDES permit will expire on November 21, 2015 .

If you wish to continue discharging, you must reapply for the permit. The State Water Control Board's VPDES Permit Regulation requires that we receive a complete application at least 180 days before the existing permit expires. The deadline for submitting the application is *May 25, 2015*. Early submissions are welcome and will better enable us to complete processing before permit expiration. You are required to submit the following forms: Form 2A, the Permit Application Addendum, the Sewage Sludge Application, the VPDES Permit Annual Maintenance Fee Form, and the VPDES Public Notice Billing Authorization Information Form (enclosed). Forms 2A and the Sludge Application are under the heading "Application Forms and Information". The permit application addendum and VPDES Permit Annual Maintenance fee form are further down under the heading "miscellaneous forms/information". Please fill out all of these and submit them along with the enclosed public notice authorization form. These forms can be found at

http://www.deq.virginia.gov/Programs/Water/PermittingCompliance/PollutionDischargeElimination/PermitsFees.aspx http://www.deq.virginia.gov/export/sites/default/vpdes/documents/VPDES Permit Application Addendum.doc http://www.deq.virginia.gov/export/sites/default/vpdes/documents/Permit Billing Information Form.doc

If you have difficulty locating/downloading any forms, please contact me. If you would like to request a waiver from any of the sampling or testing requirements in the application forms, you must submit your application and a thorough justification for the request at least 240 days prior to the exiting permit's expiration date. These waiver requests must be approved by DEQ and the U.S. EPA at least 180 days before the existing permit expires. DEQ will review your waiver request and, if it is justified, forward it to EPA. Failure to submit the waiver request by the 240 day deadline may result in the waiver being denied.

Upon completing the applications and other forms, return the original and two copies to the Tidewater Regional Office at the above address. If you have the technology available however, we would prefer that the original signature application and a disk/CD or an e-mail with the application attached be submitted. This would eliminate the requirement of submitting two copies.

There is no application fee for a regularly scheduled reissuance of an individual permit; that fee has been replaced by an annual permit maintenance fee which is to be paid by October 1 of each year. No permit will be reissued unless all maintenance fee payments are up to date.

DEQ has launched an e-DMR program that allows you to submit the effluent data electronically. There are many benefits to both DEQ and the permittee when e-DMR is utilized for submissions.

- 1) Fewer revisions for data since the e-DMR program automatically flags omissions before the data is submitted;
- 2) Cost savings on postage, copying, and paper;
- 3) No concerns about using the most current DMR e-DMR refreshes the required parameters automatically when changes are needed;
- 4) Submittals can be made on a timelier basis; and
- 5) Electronic signatures from multiple people are allowed and e-DMR can be accessed from multiple computer locations.

Application for Re-issuance of VPDES Permit No. VA0026417 Town of Boykins WWTP, Boykins, VA Page 2

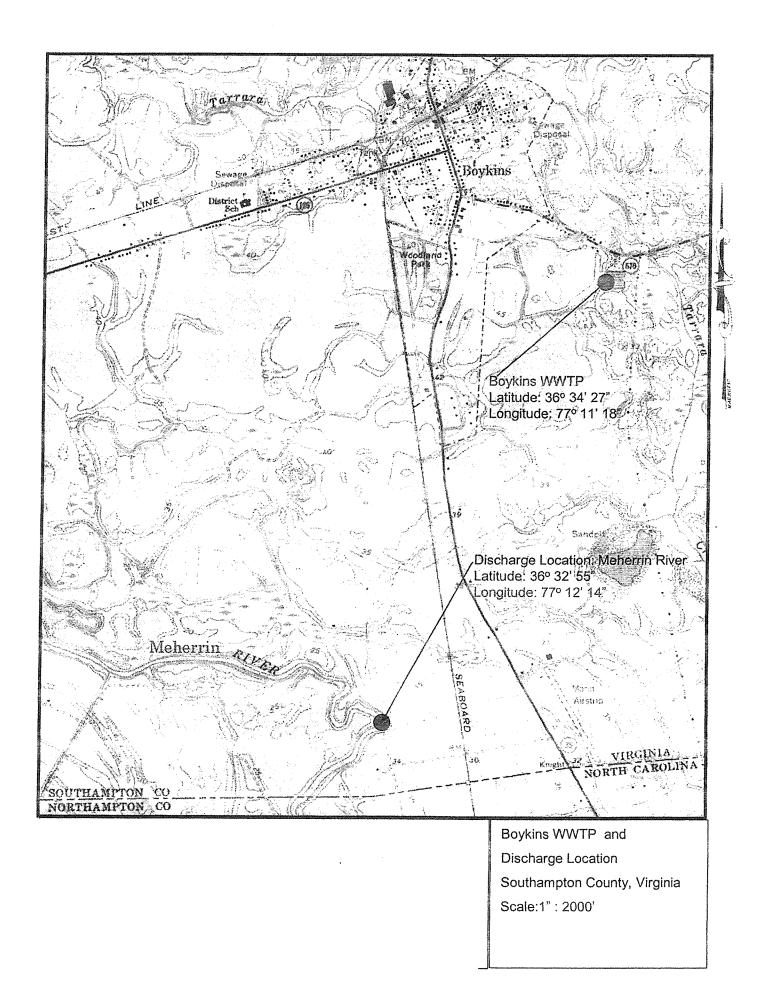
We ask that you apply for e-DMR participation now so that we will be able to complete the application process when your permit is effective. The following website provides details: http://www.deq.virginia.gov/Programs/Water/PermittingCompliance/ElectronicDMRsubmissions.aspx

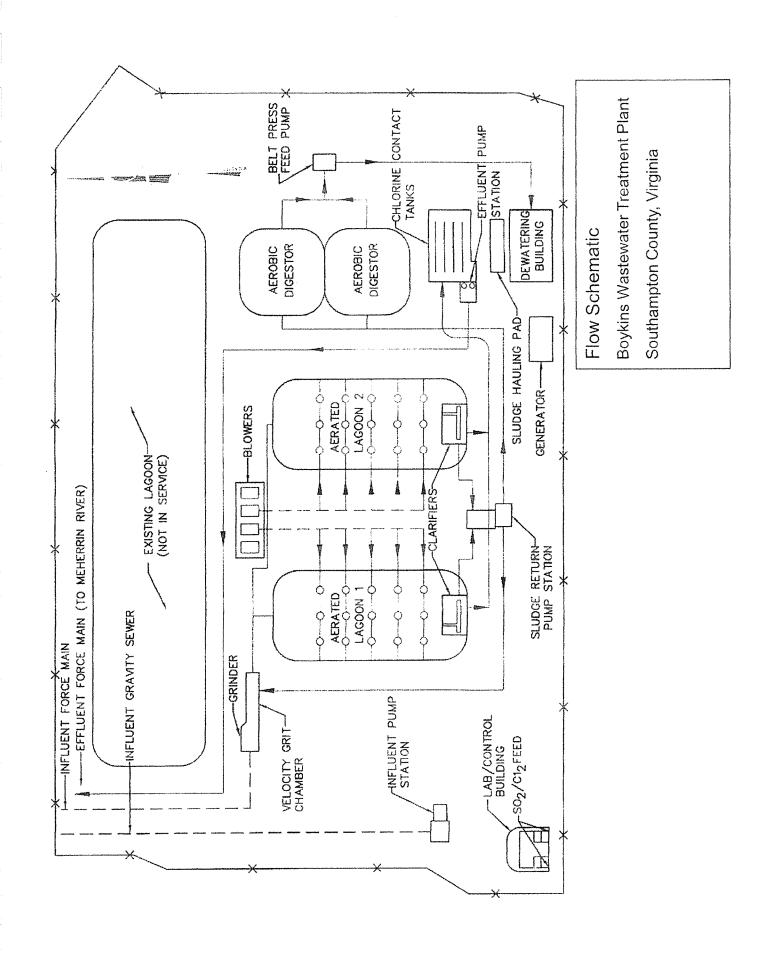
Please call me at (757) 518-2106 if you have any questions.

Sincerely,

Robert E. Smithson, Jr. Environmental Specialist Senior

Encl: Public Notice Authorization to Bill Form





SEE HOOGHAD DETAILS!-(STATE)-(PART CLASSES PLAN Boykinis WWP 2012 Upgrade VEN 1919 4474 - 4756,0 44749 Marrien DIGESTER BASINS PLAN VIEW SCALE USE' - FO AERATION BASINS PLAN VIEW SECTION VIEW (A) T SCH 40 PPE TO BATCH EXISTING AN FIRMO BRING 24" ACOVE OF CUND AND CAP EXISTING 2" 20 DH 100, CH VENTON-THE OF 2. BEE DETAILS) -NEW 15 NP AERATOR (TYP OF 8, SEE 15 NP PLOATING AERATOR ABSEMBLY DETAIL) NOTES:

NOTES:

TOTAL STATE OF THE PROPERTY OF (I'YP OF 2, DEE DETAILS) ---TACL FORM DIRECTOR HEW BB CLADE
CARSE AND
WICHOSWITCHES SECTION VIEW C CLARIFIER PLAN VIEW SECTION VIEW (B) ASSEMBLY (TYPICAL FOR 2) A Barasan Shar karasan PARM ISANDAS" CONCRETE
MAD STYP OF 7, SEE
CONCRETE PAD DETAIL)